



Archaeology in Syria

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American Journal of Archaeology, Vol. 101, No. 1. (Jan., 1997), pp. 97-148.

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HARVEY WEISS

INTRODUCTION

The number of new and expanded archaeological research projects in Syria (fig. 1) continues to grow at a rapid rate and reflects the new administrative efforts of the Directorate General of Antiquities and Museums, now under the direction of Sultan Mohesen. Indeed, the premier archaeological event of the past year was the "International Colloquium on the Syrian Jezireh," sponsored by the Directorate General of Antiquities and Museums, with the co-operation of the Free University of Berlin and the German Archaeological Institute, held 22–25 April 1996 in Deir ez-Zor.

Two aspects of this colloquium marked new directions in Syrian archaeology. First, the colloquium celebrated the opening of the new National Museum in Deir ez-Zor. The museum, under the direction of Assad Mahmoud, houses archaeological material from the provinces of Deir ez-Zor and Hasseke. The galleries of the museum feature photographs and text panels highlighting the cultural developments of each period from the Palaeolithic to the Islamic, as well as vitrines displaying an impressive range of meticulously labeled artifacts, most previously unavailable to the public and of exceptional interest to the international archaeological community.

Secondly, the colloquium itself brought together for the first time some 60 Syrian, European, and American archaeologists responsible for much of the pioneering research carried out in the Jezireh over the past two decades, particularly in both Hasseke and Deir ez-Zor provinces but also the regions of the middle Euphrates and the Balih. The colloquium, including both thematic and chronological sessions, encouraged wide-ranging discussions among archaeologists specializing in different chronological periods and representing diverse methodological orientations, thereby providing a provocative forum for

establishing regional syntheses and future research goals. Lectures and discussions focused on issues such as population and settlement histories, soils, subsistence, land use and technology, dynamic regional climates and their effects upon cultural development, and chronological refinements and synchronisms that have emerged over the past 20 years. The recent excavations at Tell Banat and Tell Beydar (see below) drew considerable attention for their important contributions to third-millennium studies.

For current reports on Syrian research, two publications are now indispensable: the invigorated and encyclopedic "Chronique des activités archéologiques en Syrie," by Michel al-Maqdissi of the Directorate General of Antiquities and Museums, published in *Syria* 70 (1993) 443–576 and 72 (1995) 159–269; and *Orient-Express*, edited and published triannually by the Institut d'art et d'archéologie in Paris. Both publications provide up-to-date bibliographies of articles and monographs on Syrian archaeology as well as listings of conferences and exhibitions.

Twenty-seven Syrian archaeological reports are presented here, covering approximately two-thirds of the field research undertaken in 1993–1995 (fig. 1).¹ The reports are listed alphabetically, as many of them summarize research across several distinct time periods.

EXCAVATIONS AND SURVEYS

¹Abd. Uwe Finkbeiner, Universität Tübingen, reports:

The third excavation campaign at Tell el-'Abd lasted from August through October 1994.² Since the water table had risen more than 4 m since the preceding year, we were forced to alter our excavation plans considerably. Some of the areas we had planned to excavate were completely under water,

¹ Publication of this newsletter on archaeology in Syria, as well as of the previous Syrian newsletters (*AJA* 95 [1991] 683–740 and *AJA* 98 [1994] 101–58), has been made possible in part by a generous subvention from the Ministry of Culture of the Syrian Arab Republic and its Minister, Her Excellency Najah Attar. The editors of *AJA* and I are very grateful for this continuing support.

The authors of these reports join me in thanking Sultan Mohesen, Director General of Antiquities and Muse-

ums, Adnan Bounni, Director of Excavations, and the regional representatives of the Directorate General for their generous support, advice, and collegiality. I am indebted to the authors of these reports for their cooperation and interest, and to Regan Huff for editorial assistance. Several reports were translated by Ulja Kasten and myself.

² For a detailed report of the first two seasons in 1992 and 1993, see U. Finkbeiner, "Tell el-'Abd," *DM* 8 (1995) 51–83.

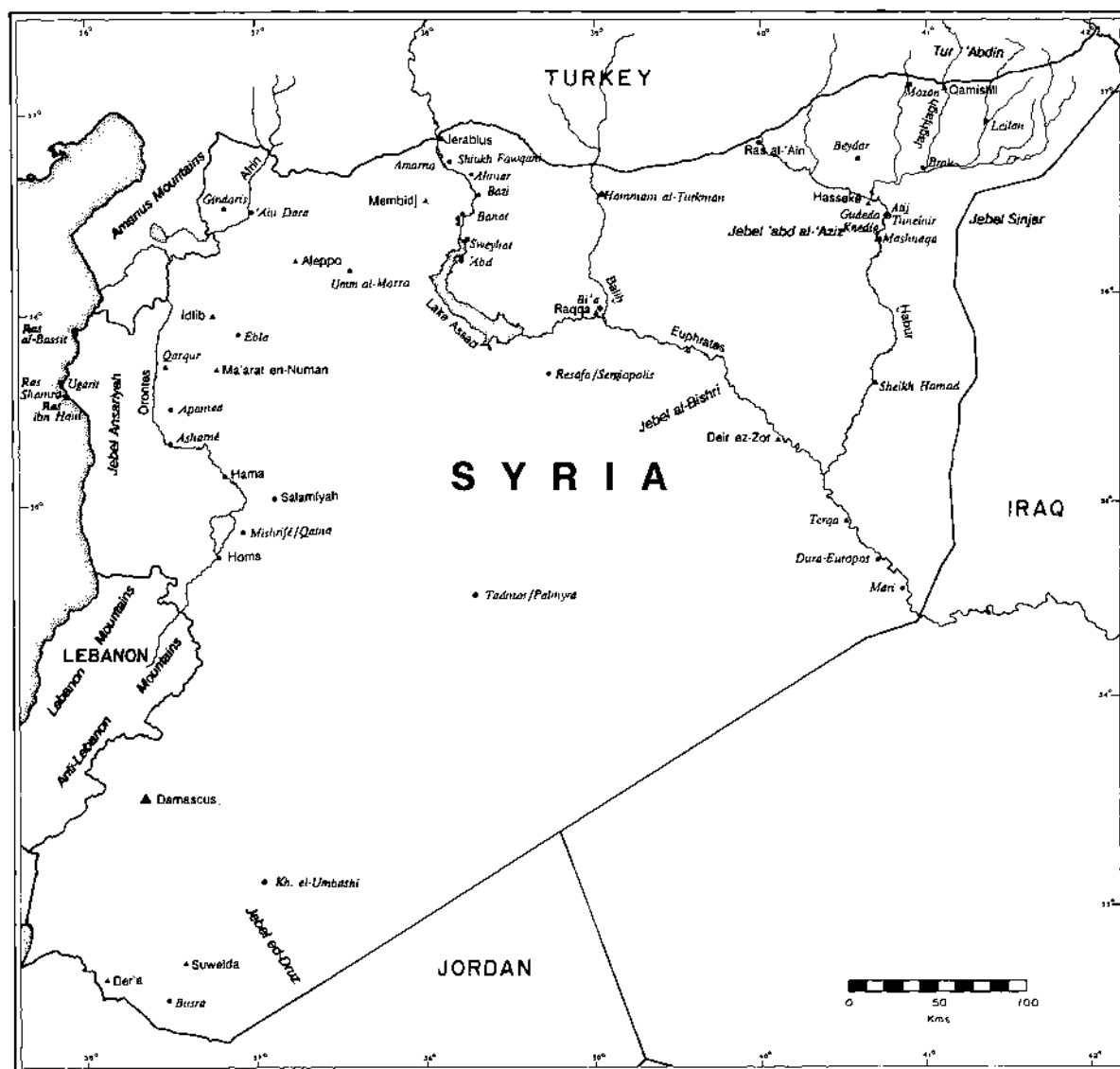


Fig. 1. Map of archaeological sites in Syria referred to in text

while others such as the stratigraphic step trench in excavation area II on the western slope had been completely eroded by water. On the other hand, new findings were exposed by erosion that enhanced our knowledge of the site remarkably. Plans for excavation were adapted to the new topography (fig. 2).

Area I. Due to the considerable rise of the water table, it was impossible to excavate the older EB levels in this area. While much of the earlier excavations were completely flooded, a few squares were preserved. In the west of square 18/25 the erosion edge was so straight that we could use it as a section. This section revealed that the upper levels contained a fairly large building, and on that basis we decided to open two excavation areas: a western one in squares 18/25-26 and an eastern one in squares 19/25-26 and 20/25-26.

In addition to remains of architecture likely to be Hellenistic, the enlarged square 18/25 yielded the ground plan of a 6 x 8-m room belonging to a palatial building. The western wall had fallen, but the southwestern interior corner remained intact, making the reconstruction quite secure. The northern and southern walls showed three building phases corresponding to three floors. All three floors were clearly defined by ashes or burnt debris and by vessels in situ.

Excavation in the neighboring square 19/25 was extremely difficult. The latest remains of the EB palace lay just underneath the surface at the north, but most of the square was disturbed by 17 large, deep pits. In the latest phase, the wall at the north end of the palace with a passage to the north toward the city wall was still extant. Only parts of the middle

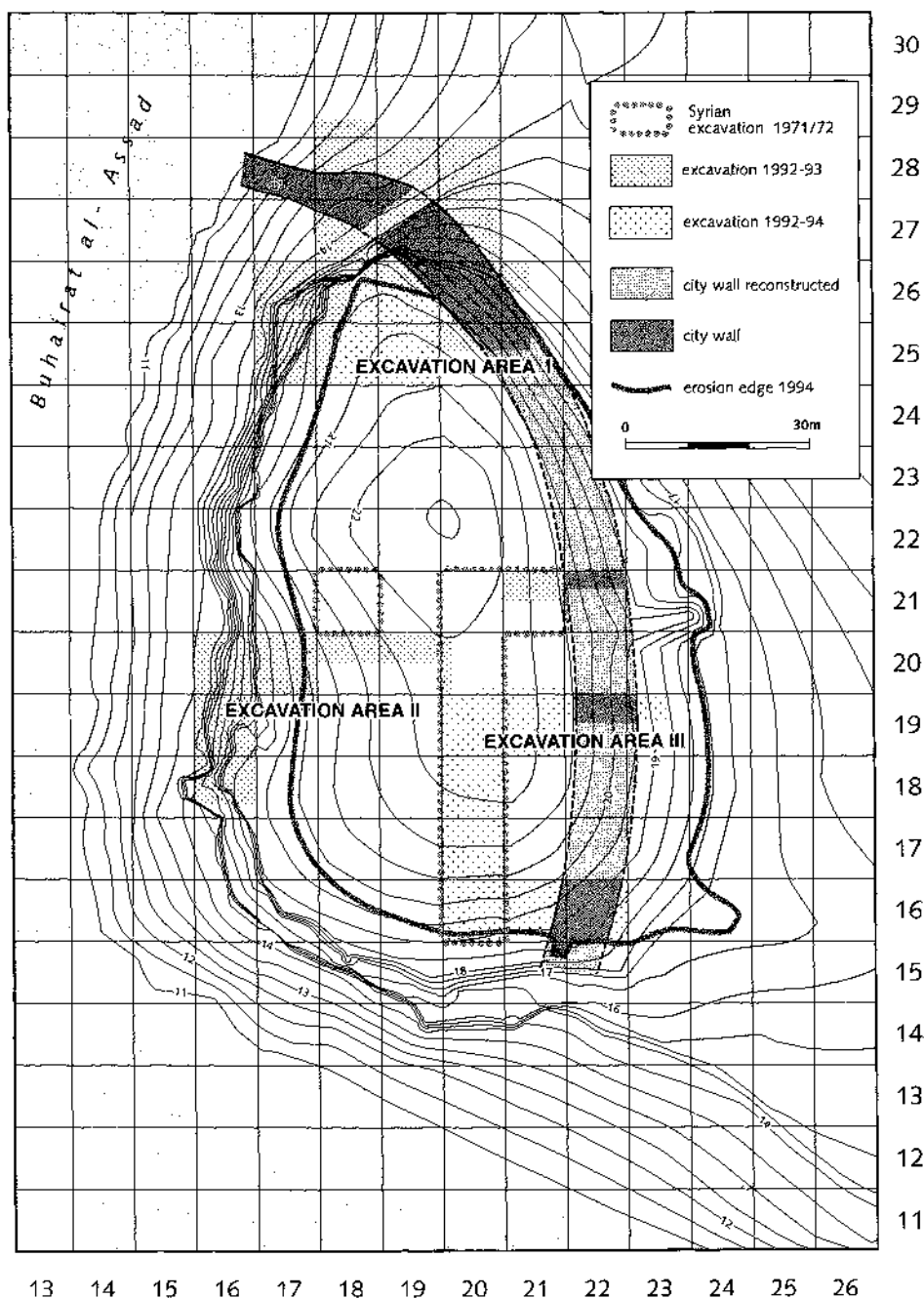


Fig. 2. 'Abd. Topographic plan and excavation areas.

phase are congruent with the later phase. The northern wall runs almost parallel to the grid, and also has a passage to the north allowing access to a tower and, possibly, to a rampart walk. In the interior room, four floors could be differentiated.

The earliest phase is represented only by two parallel walls in the balk between 18/25 and 18/26. As the walls are only about 70 cm apart and the interval was deliberately filled with pebbles, this may be a double wall, possibly the substructure of a rampart

walk. Both walls have deep foundations and must be viewed in association with the walls of the earlier phase exposed in 1992 in square 17/25. Their connection with the middle phase is obvious, too, as they form the foundation of the northern outer wall of that phase.

At least one more room must have existed further to the east in square 20/25. It is defined by the northern wall of the later phase and by the city wall. The two walls are bonded, thus proving that the recon-

struction of the palace in the later phase went hand in hand with the repair and renovation of the city wall. In contrast, the tower and bastion of the middle phase are built against the city wall from the inside.

The most important discovery on the outer face of the city wall was caused by erosion: water had taken away all reinforcements and laid bare the stone foundation of the core wall. Further to the east a supporting wall built of large stones rested on the EB glacis. This wall is part of the Hellenistic-Roman fortification, which was defined in former campaigns. Well-preserved bricks in receding layers were visible in the section under the later stone wall, revealing the construction method of the EB glacis.

Due to erosion, the results of this campaign cannot be directly connected stratigraphically to the results of earlier campaigns. All phases obviously belong to a single building, which, because of its situation, dimensions, and construction, may confidently be called a palace or fortress. This interpretation is supported by the fact that the city wall and palace were erected at the same time, at the end of the EB II period or the beginning of EB III. As the 1993 season proved, the oldest floor of the city gate and the oldest floor of the palace are contemporary.

Area III. In 1993, the excavation of houses A, B, and C in squares 20/18-19 was completed (fig. 3). All belonged to phase 2, including a small street that divides A and B in the north from C in the south. House E, however, underlying C, is part of an earlier phase 3, which could also be found in a few walls under A and B. Both phases date to the EB III period.

In 1994, neighboring areas were opened in order to examine the structure of the EB residential quarter stretching eastward to the city wall. House K, a structure with several rooms, was exposed against the city wall. It belongs to phase 2 along with houses A-C. As the northern and western outer walls are continuous, access must have been from the lane to the south.

In the eastern section, the city wall leans heavily to the west. House K did not withstand this pressure any more successfully than houses A and B. The rooms of all three houses had been completely filled, as they were in danger of collapse. Thus, all installations and vessels set into the floor were well preserved; all movables had been taken away. In the southern and eastern rooms of house K there were

traces of at least three phases of later use; these are not yet shown on the plan but can also be dated to the EB III period. All later material comes from pits and other disturbances.

From these excavations, a picture emerges of a slowly changing residential quarter with houses often of a single room and small courtyards. The two lanes may have been connected in phase 4; possibly the northern lane ended at a second gate, from which a track led around the deep wadi in the south toward Munbaqat, the ancient Ekalate.

The city wall was exposed on top of the tell and at the tell's southern edge where a broad stone foundation projected 2-3 m into the lake. The construction of the fortification is essentially the same as in the north: first, a mudbrick wall about 2.5 m wide was erected on a high stone foundation as the core wall. For reasons of stability, reinforcements were soon added from both the outside and inside, broadening the wall to almost 10 m. In square 21/15 the wall bends distinctly toward the west, reaching the bank of the Euphrates above a wadi running east to west.

The last excavation campaign at Tell el-'Abd yielded relatively few small finds. Terracotta figurines are again the most numerous, followed by stone tools and a few metal objects. A large quantity of potsherds was also collected, mostly of EB III date. According to W. Orthmann, there are many parallels to Halawa B pottery, which is of a slightly earlier date. Based on these ceramic assemblages, a secure dating of the residential quarter from phases 2 to 4 should be possible to establish.

Ahmar. Guy Bunnens, University of Melbourne, reports:

The last three excavation seasons of the Melbourne University archaeological expedition to Tell Ahmar/Til Barsib in 1993, 1994, and 1995 have been extremely productive.³ As in the past, we concentrated primarily on the Iron Age buildings of area C in the western part of the site (fig. 4), but investigations were also conducted in other areas, including a stratigraphic sounding on the main tell (area S) and in the northern sector of the Lower City (area E). In 1995, a team of archaeologists from Columbia University and the Metropolitan Museum of Art in New York, led by John Russell (Columbia), joined the Australian expedition and was in charge of area E and the sounding in area H.

³ Excavations were made possible by a three-year grant from the Australian Research Council complemented, in 1993, by a grant from the Ian Potter Foundation. For a popular account of the major finds, with color photographs,

see C. Zaccagnini, "Sulla collina rossa: Sensazionali scoperte a Tell Ahmar, l'antica Til Barsib, capitale di un potente stato aramaico nella Siria settentrionale," *Archeo* 10 (Sept. 1995) 24-33.

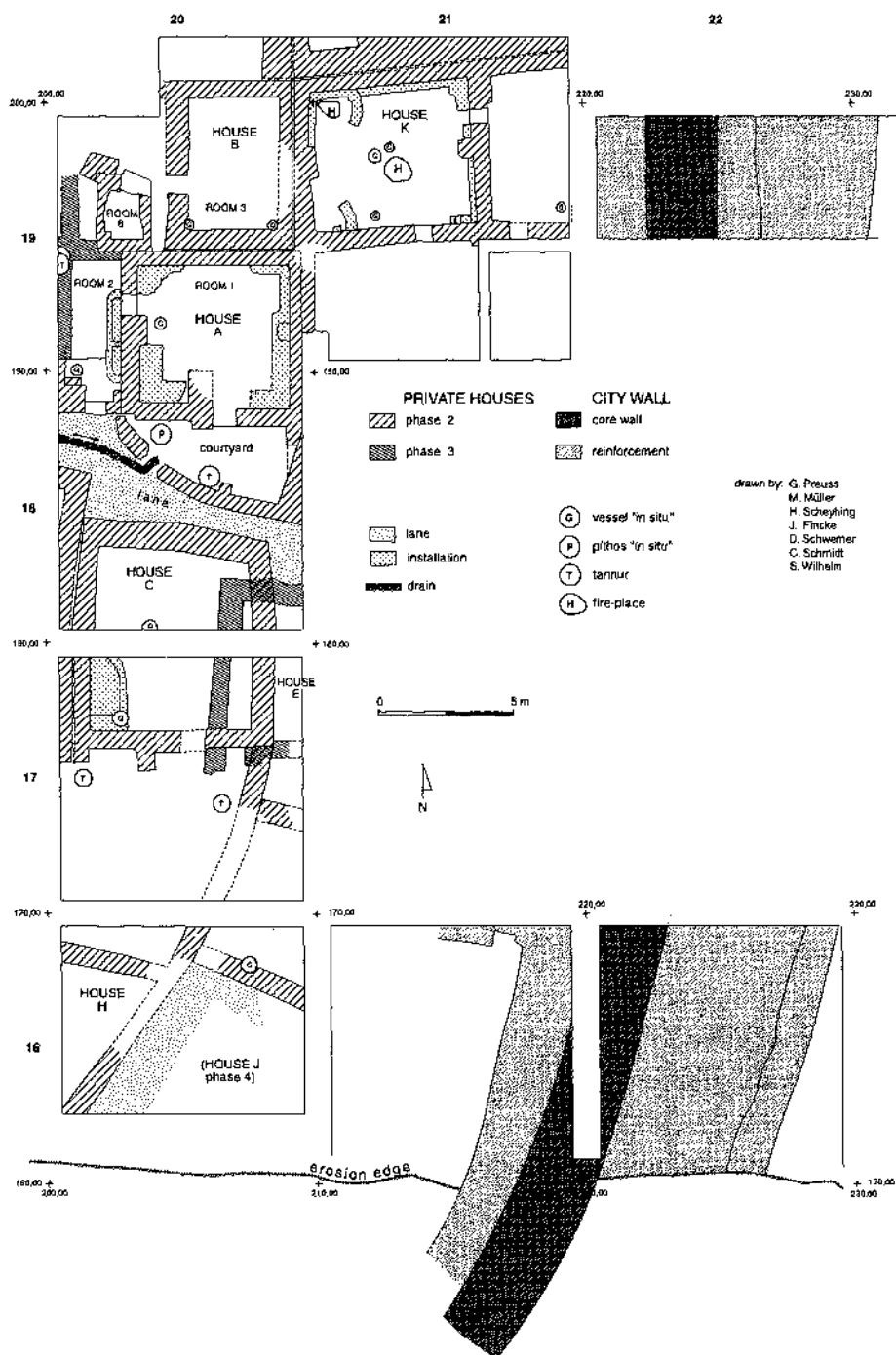


Fig. 3. 'Abd. Plan of area III.

The excavation of the large Iron Age building in area C, called building CI, was extended to the east, toward the modern road. A new room (XV) could thus be explored as well as part of another room (XVI) and the north corner of courtyard XIII. A few soundings were excavated down to sterile soil under room XV. It was thus confirmed that the building went through three main phases during its period

of occupation. The earliest phase was destroyed by a severe fire in this part of the house. In contrast to what has been observed in other parts of building CI, remains of earlier constructions were discovered under room XV. Walls of a slightly different orientation have been exposed. Their irregular construction technique may indicate that they were foundation walls. The building they were intended to

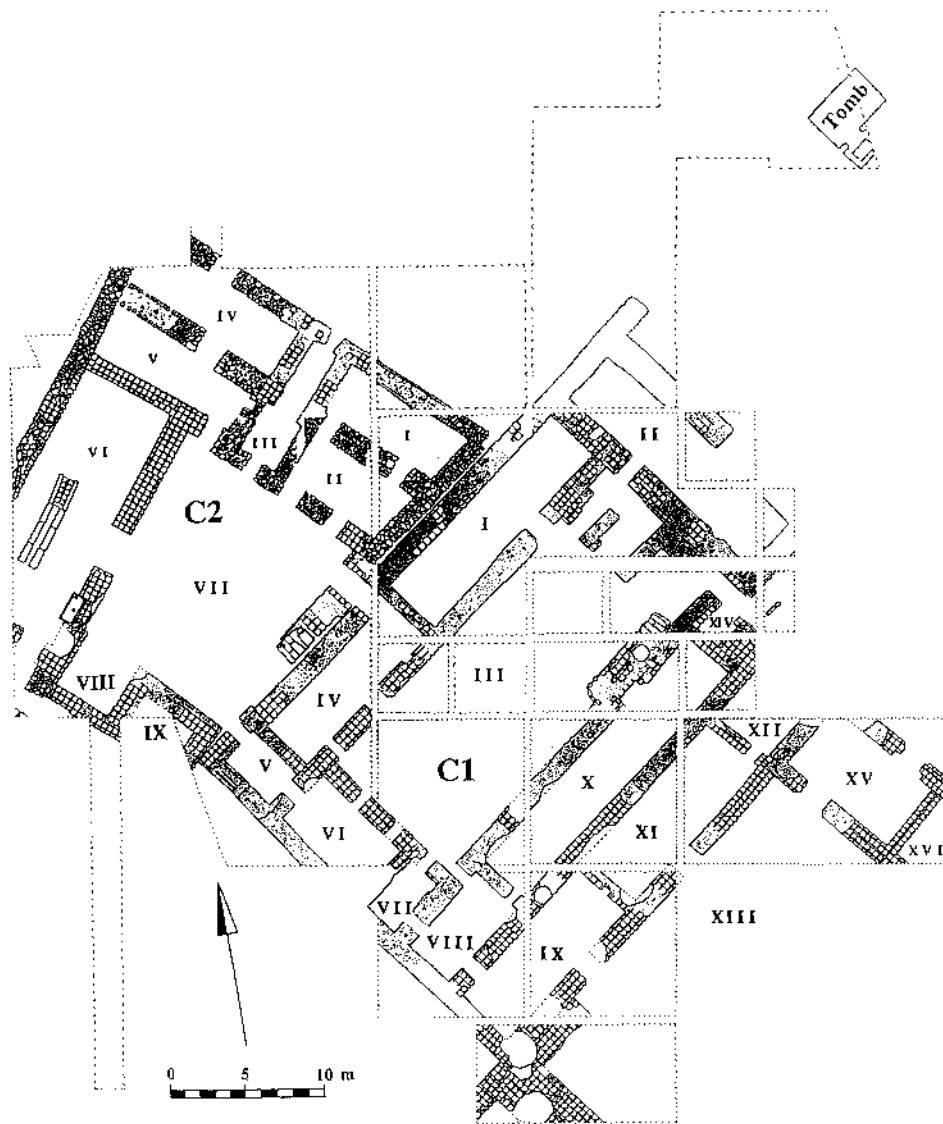


Fig. 4. Ahmar. Plan of Iron Age buildings in area C.

support either was never built or was destroyed when building C1 was erected.

Two doorways were cut into the northeast and southwest walls of room XV. They had recessed door frames and, in the earliest phase, stone thresholds as well as door sockets covered by square slabs decorated with concentric circles around the holes of the doorposts. The southwest doorway was already blocked during the earliest phase.

In the destruction level of the earliest phase, several cuneiform tablets and two Aramaic tablets were found in and around the doorway between rooms X and XI. The texts have been prepared for publication by Stephanie Dalley. Nine tablets are rather well preserved and five consist of large fragments. With the exception of one economic text, all are le-

gal documents written before witnesses. Three documents bear seal impressions. The texts seem to form an archive belonging to a certain Hanni whose name recurs in several documents. A few dates, given according to the Assyrian eponym system, are preserved. According to Dalley, they belong to the end of the Assyrian Empire, the latter part of the seventh century B.C. The tablets provide valuable information about the date of the destruction in the earliest phase of building C1; it is likely that the subsequent phases lasted until after the fall of the Neo-Assyrian Empire.

In room XV, the stone slab that formed the south corner of the threshold of the blocked doorway in the southwest wall was turned over to reveal a five-line Luwian inscription on its underside. According

to David Hawkins, who will publish the text, it is an inscription concerning Hamiyatas, king of Masuwari, already known from several inscriptions. The new stele mentions, i.e., granaries and the weather god of Aleppo.

In the debris from the destruction in the earliest phase, in room XV, a collection of about 10 carved ivories was found together with a few uncarved ivory plaques (see G. Bunnens's forthcoming article on the carved ivories from Tell Ahmar in *AJA* 101:3 [1997]). The carved ivories are extremely diverse in shape and style. Three ivories deserve special attention. One represents an Egyptianizing head about 6 cm high (fig. 5). The quality of this work, strongly reminiscent of the so-called Phoenician style, is exceptional. Another ivory is carved on both sides. It is about 16 cm high and shows a griffin standing on a tree on one side, and an elaborate palmette on the other. The third ivory, about 32 cm long and 10 cm high, depicts a procession of four figures carrying provisions. They are led by a musician. As the ivory is broken at both ends, the scene originally may have been longer.

In previous seasons another structure, building C2, had been located to the northwest of building C1. All but the southwest end of this structure has now been uncovered. The building is more than 35 m long and about 25 m wide and consists of more than eight rooms around the northeast, northwest, and southwest sides of a large courtyard (VII). The largest one, room VI to the northwest, was a reception room with a line of stones down the middle, probably for a sliding hearth. The main entrance to room VI passed through the southeast wall. A niche with a flat stone slab was built on the southwest side of the doorway, inside the room. A path paved with baked bricks linked room VI with building C1 through courtyard VII. A room of the *liwan* type, typical of Neo-Assyrian architecture, opened into the southwest corner of courtyard VII. The new excavations revealed that the brick structure formerly identified as building C3, against the southwest corner of building C1, is in fact one of the rooms of building C2 (room IX).

The most impressive feature of building C2 is the mosaic pavement found in its courtyard (VII). Very well preserved, the pavement is about 14.7 × 13 m and consists of black and white river pebbles arranged in a checkered pattern.

The connection between buildings C1 and C2 has been clarified. Since no rooms exist on the southeast side of the central courtyard of C2, near C1, and two doorways give access from C1 into the courtyard of C2, it is clear that C2 was conceived, from the very



Fig. 5. Ahmar. Ivory Egyptianizing head from building C1.

beginning, as an extension of C1. The absolute elevation of C2 is 50–100 cm higher than that of the earliest phase of C1, suggesting that C2 was built sometime after C1. Excavation in the southwest corner of C1 showed, however, that building C2 must already have existed during the earliest phase of C1. The construction of building C2 seems to have coincided with a reorganization of building C1 after its conversion into an industrial structure, possibly devoted to weaving activities. The residential quarters were then presumably transferred to the newly erected building C2. Another indication of this reorganization is given by the blocking, mentioned above, of one of the doorways in room XV of building C1.

Irrigation work in the immediate vicinity of the excavated part of area C, to the north, accidentally revealed a large chamber tomb. Its excavation brought to light a long underground room, measuring 4.5 × 2.7 m, with a stepped dromos on the southeast side and a barrel vault of baked bricks. A hole had been pierced in the northwest wall, probably by ancient robbers. Against the northeast wall of the tomb, a ceramic coffin was found resting on a square mud-brick structure probably intended to encase the coffin. The tomb was entirely empty except for a beaked lamp on a pedestal, but in the topsoil im-

mediately to the north of the tomb, carved ivories were found.

To the west of the tomb, in a pit containing rocks and stones, three pieces of a basalt statue were found. The reconstructed statue, probably defaced in antiquity, represents a beardless man with curling hair and clasped hands. Stylistically the statue can be dated to the second half of the eighth century.

In area E, the existing trench was extended to an area roughly equal to three 10 × 10 m squares. In addition to the building already partially excavated, now called building E1, another building, called E2, with a slightly different orientation, was discovered to the west. Its most noticeable feature is a mosaic pavement of black and white pebbles in a checkered pattern, similar to the mosaic previously excavated in area E and to the large mosaic of area C, but constructed with longer and thinner pebbles. A column base was found in place on the eastern edge of this pavement. The new building E2 seems to be contemporary with E1, dated to the end of the Neo-Assyrian period or slightly later.

A test sounding in the southeast corner of area E was dug down to nearly 3 m below the surface without reaching bedrock. Additional soundings in various parts of the site attempted to determine the extent and density of the occupation of Iron Age Tell Ahmar. A series of soundings across an area 45 m long and 3–6 m wide were opened to the west of area C in order to find the Iron Age city wall. Although the bedrock was reached in two places, no firm conclusion could be drawn concerning the wall. A large patch of pisé at the west end of the soundings could represent the ancient fortifications of the tell. No other architectural remains could be identified in these soundings. A small trench in area G, at some distance to the north of area C, also failed to produce cultural remains. Another sounding in area H, in the middle of the settlement, was placed in a long depression that may mark an ancient road going from the Lions' Gate to the Acropolis. However, no stratification was identified. These observations suggest that there may have been gardens and open areas inside the fortification walls of Til Barsib. Only a small excavation in area F, to the south of the Lions' Gate, revealed traces of several small structures. The discovery of a piece of roughly carved ivory in area F may indicate that ivory was worked in this part of the site.

Work continued in the sounding opened in area S on the eastern slope of the main tell. A huge fortification system dating to the Iron Age has been recognized. A wall more than 8 m thick stood at the top of the tell, and a series of terraces were constructed down to the base of the tell. The entire length of the terracing structure was about 13 m.

The archaeological strata beneath the fortification system have been partially explored. The pottery, including Combed ware and ovoid bases with round knobs, points to a date in the Middle or Late Bronze Age. A burial yielded a cylinder seal of a style very close to that of the Alalakh VII cylinder seals. The main scene shows a male figure, on the left, worshipping a nude goddess standing on an animal, while on the right stands an interceding goddess of the so-called Lama type.

'Atij. Michel Fortin, Université Laval, Quebec, reports:

The fifth and final season of excavation by the Canadian expedition at Tell 'Atij took place from April to June 1993.⁴ We concentrated exclusively on the main tell, leaving aside the necropolis situated on a secondary tell. The most important operation, six 5 × 5 m squares in the middle of the main tell, continued work undertaken in previous seasons.

Structures uncovered in level IX at the end of the 1992 campaign turned out to belong to two building phases. They were adjacent to a courtyard that was already evident in level X below. The open space in level X bordered a 3.5 × 5.8 m room with walls corresponding to those of two rooms above. Walls from the structure in level X were constructed in turn almost exactly above those from a 4 × 5.8 m room in level XI (fig. 6). A courtyard existed at the same location in level XI, but was of a smaller size. While one of the rooms of level XI opened onto the compacted earth floor of the courtyard, the other one led to an alley paved with stone slabs. Beneath these structures a layer of gray fill had been used to level the area, but only a few centimeters underneath the level XI remains, walls belonging to level XII emerged: two grill-plan buildings measuring 5 × 3.3 m and 3 × 3.2 m (fig. 7). These were related to a compacted earth courtyard in which we uncovered several hearths and some badly preserved low walls.

The deposit forming level XIII accumulated on sterile soil and was compact and hard to dig. Among the few structures associated with this level were four

⁴ This season, like previous ones, was subsidized by the Social Sciences and Humanities Research Council of Canada. A substantial preliminary report on this campaign is due to appear in *Syria* 62 (1995). Preliminary reports on

the botanical and faunal aspects of this project appear in *Bulletin of the Canadian Society for Mesopotamian Studies* 29 (1995).

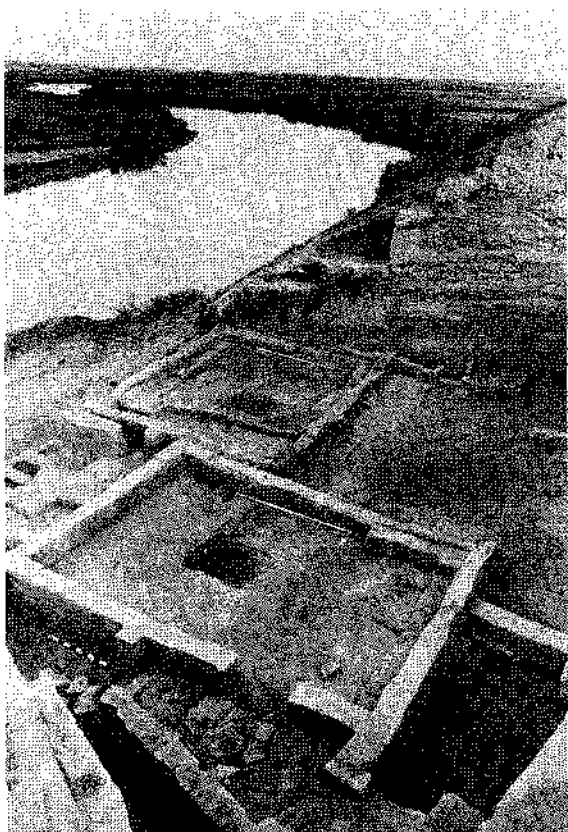


Fig. 6. 'Atij. Structures and courtyard of level XI.

low walls enclosing a small square room with a large circular oven and a single pit dug into the natural layers below. Another nearby pit contained ashes and the complete skeleton of a cow. Two thick, parallel walls, reused in the level above as a platform, might have belonged to a large building still buried beneath a significant accumulation of unexcavated debris. These architectural remains, although scanty, lead us to believe that Tell 'Atij had monumental buildings from the time of its foundation. Diagnostic sherds date this foundation to the Middle or Late Ninevite 5 period; they compare well with examples from Leilan IIIc (2700–2800 B.C.).

Flotation of soil samples by Joy McCorriston (University of Minnesota) isolated carbonized grains from various species growing in the surrounding valley. Contrary to what we first thought, grains stored in the silos at 'Atij were not imported from the plains to the north. A large number of faunal remains were also collected and are currently being analyzed by Melinda Zeder (Smithsonian Institution). A small sector consisting of two 5×5 m squares was opened on the very summit of the main tell to collect soil samples from the six upper levels partly excavated in previous seasons. A new silo containing carbonized grains was incidentally discovered in the process. It was complete and well preserved, $1.9 \times 3.6 \times 1.6$ m, made of mudbrick and plastered on the interior.

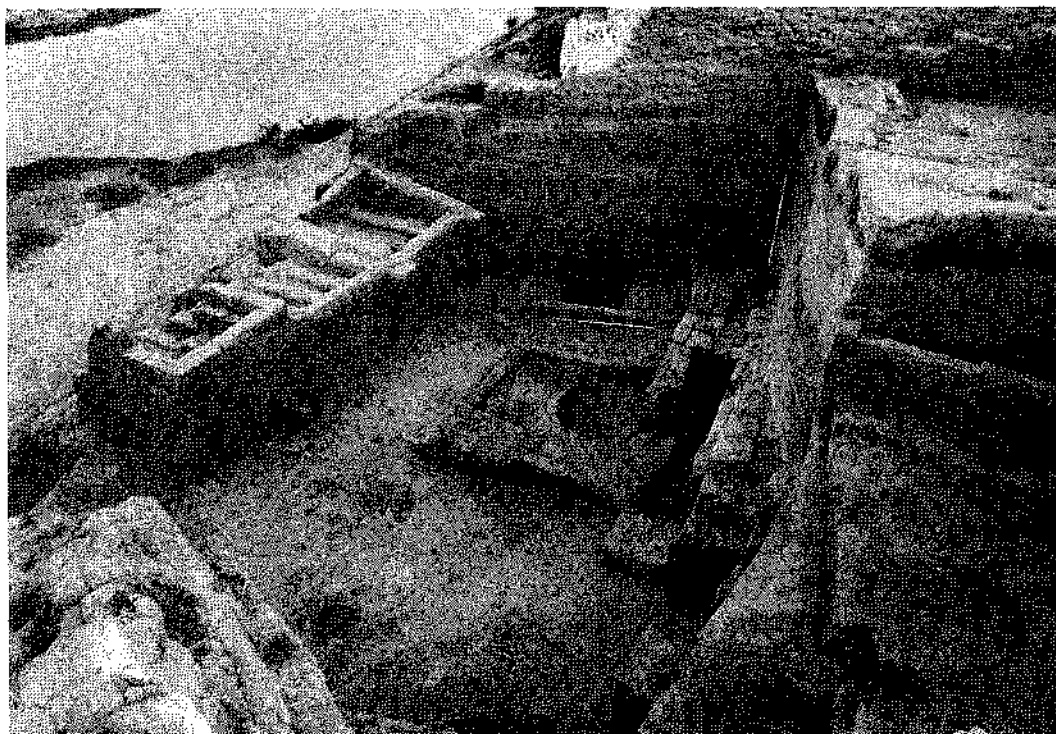


Fig. 7. 'Atij. Grill-plan buildings of level XII.



Fig. 8. Banat. View of Tell Banat North.

Another important discovery made in this sector is a 2.5-m-thick, massive mudbrick wall, which, given its alignment, originally encircled the entire tell. This wall was also exposed north of the main tell where it was possible to trace its complete height of 4 m. Since its foundations rest on sterile soil, the wall was clearly designed to defend the site from the earliest occupation. If, as we think, the site was a grain redistribution center, a wall was probably deemed necessary to defend the important buildings on the main tell and to protect the site's economic interests. Another result of tracing the city wall is the discovery that more than half of the site has been washed away by the river.

At the base of the southern slope of the main tell, we opened seven 5 × 5 m squares adjacent to those excavated in 1986 and 1987 in which domestic structures were found. This time we unearthed only a few unrelated walls, forcing us to conclude that the domestic quarter associated with the redistribution center on the main tell was not located there. Finally, a 15 × 5 m test trench was sunk at the southern tail of the main tell in order to find out whether human occupation extended in that direction; the deposit

turned out to be culturally sterile. A 1994 study season and pedological investigation relating to 'Atij are described below under Tell Gudea; production of a final report is underway.

Banat. Thomas McClellan and Anne Porter report:

The 1994 and 1995 campaigns of the Euphrates Salvage Project focused on Tell Banat and Tell Banat North, two components of an extended settlement complex on the left bank of the Euphrates in the Tishrin Dam salvage zone.⁵ Occupation of the site can be divided into two phases, period II, the mid-third millennium, and period I, the third quarter of the third millennium.

A number of large-scale constructions have been exposed at the Banat site cluster. At Tell Kabir, a 13 × 22 m building dating to the mid-third millennium or earlier is tentatively identified as a long-room temple, while monuments from both periods of occupation are present at Tell Banat North. An artificial gravel platform extends underneath a series of public buildings and a burial complex at the village of Tell Banat.

Tell Banat North. Tell Banat North, a mound 100

⁵ For previous reports, see T.L. McClellan, "Banat," in H. Weiss, "Archaeology in Syria," *AJA* 95 (1991) 701-702; A. Porter, "Kabir," in Weiss 1991, 721-22; McClellan and Porter, "The Third Millennium Settlement Complex at Tell Banat 1994," *Orient-Express* 1994:3, 81-82; Porter, "The Third

Millennium at the Tell Banat Settlement Complex: Tell Kabir," *DM* 8 (1995) 125-63; and Porter, "Tell Banat Tomb 1," *DM* 8 (1995) 1-50. Both campaigns were funded by the National Endowment for the Humanities and private donations.

m in diameter and 20 m high, is a monument consisting of layers of reddish gravel and powdery white marl (fig. 8). Within this period I structure, called White Monument I, is an earlier version known as White Monument II, which has a corrugated pisé surface. This surface has been traced almost to the top of the modern mound. Although damaged by erosion, the apex of the monument is small in area and shows no sign of any special construction, thus eliminating the possibility that a shrine surmounted it. Some of the pottery and associated bone deposits that established the period I date for the construction of White Monument I were found on or near the surface of White Monument II, providing a *terminus ante quem* for the earlier structure.

Horizontal lines of terraces are visible in section in the construction fill of White Monument I, but exposure of their surfaces showed them to be rough and irregular and they were probably covered at the time of building. Any evidence that outer extensions of these terraces originally formed a stepped structure, or a pisé cover like that of White Monument II, has been destroyed by erosion.

Tell Banat area C. Sounding C, opened during previous excavations, was expanded in 1994 to include all the available space between three village compounds and the mosque. This area is dominated by artificial platform C, comprised of gravel deposits at least 3.5 m deep. While this platform is still imperfectly understood, there is no doubt that it reflects a major earth-moving operation, comparable in energy expenditure to White Monuments I and II. In one place the gravel platform covers a sloping construction with a corrugated surface of pale pisé similar to that of White Monument II. The location of this structure, currently designated White Monument III, is too constricted by modern village buildings to expose further. It is stratigraphically sealed by the platform, which in turn lies beneath building 7, dated to period II.

Building 7 is laid out on at least three terraces descending from east to west across a distance of 45 m. These terraces are dug into platform C. The architecture that once stood on the highest terrace is almost entirely eroded, with the exception of two column bases and one in situ subsurface column foundation. On the second terrace, a series of rooms are arranged around a 7 × 7 m floor of baked brick tiles mortared by bitumen, from which steps lead on both the north and south sides to the rooms situated on the third terrace. Also on the second terrace, to the south, is a room with four circular depressions, ca. 50 cm in diameter, along a scalloped floor edge. These indicate the presence of columns

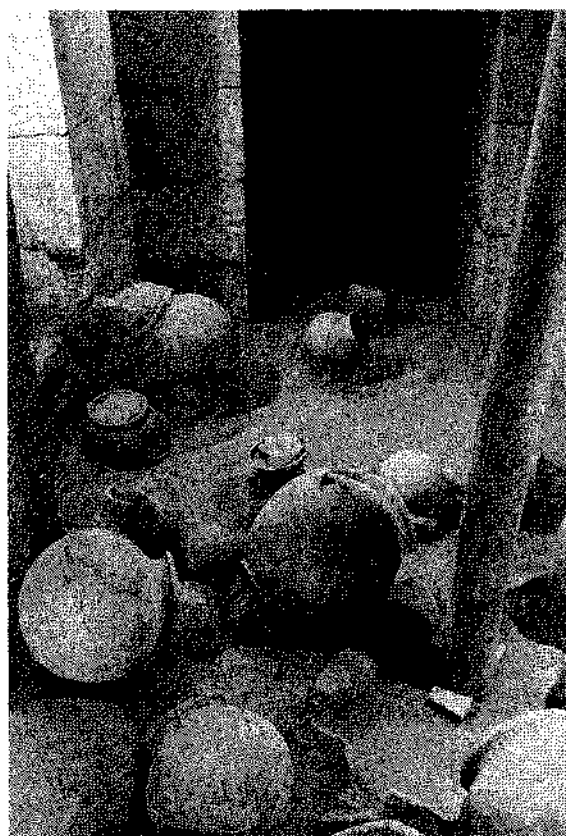


Fig. 9. Banat. Tomb 7, chamber C, with doorway to chamber D.

forming a narrow portico from which a stepped revetment led to the lower terrace. Building 6, which dates to period I, is a large edifice with thick walls built out of sizable boulders. Although different from building 7 in plan and orientation, it reused the main floors of the earlier structure, and consequently its terracing. Despite interruptions by village houses and pits, traces of the walls of building 6 extend over the surface for more than 45 m north to south.

To the southeast of buildings 6 and 7, and also cut into the gravel platform, is tomb 7 (fig. 9), around which a series of burials ranging from the mid- to late third millennium B.C. were located. Tomb 7 is a multichambered stone building that has all the hallmarks of a burial place for a high-ranking person or family. The roof is formed by nine large limestone slabs, each approximately 3 × 2 m. The stone blocks used in the walls were carefully cut and fitted into place. Bitumen was used not only to seal the massive roof slabs and mortar and patch the masonry of the walls, but also to cover the brick-tile floors. Preliminary analysis suggests that the tomb was constructed at the same time as building 7, that is, the mid-third millennium. The contents of the tomb are mixed,

however, including material from both Banat periods, indicating that the tomb was reused.

Many Plain Simple ware and Euphrates Banded ware vessels have been identified in a preliminary analysis of the tomb's pottery. In one chamber, a niche contained Syrian bottles that had once been decorated with an elaborate design of tiny shell and stone beads. In the northwest corner of chamber D, a circular alabaster tabletop leaned against the wall. From the period of reuse, a disarticulated burial was found associated with a bronze pin, a gold pendant, and two lapis lazuli "fly" beads as well as other objects.

In chamber F of tomb 7, a wooden box positioned diagonally in the center of the room had mostly disintegrated, leaving a thin wooden core encased by mud. The corners of the box were marked by bronze straps for each plank that once fit 2 × 2 cm staves. In the northwest corner of the chamber, we found a small shallow stone bowl with deep triangular incisions for inlay. Beside it was a small broken bottle and two lapis lazuli bottle stoppers inlaid with florettes of gold. The northern niche of chamber F was damaged by stone robbing in antiquity, but nevertheless contained a bronze pin with a bird head and an ostrich egg container with a stone stopper inlaid with lapis lazuli.

Tell Banat areas D and F. Area D, on the western side of the site, was devoted to pottery production. Five kilns and a series of associated buildings have been excavated, and traces of over 15 kilns are visible on the surface. Two types of kilns have been recorded: small rectangular structures that appear to date to period I, and large oval structures belonging to period II. Two main architectural levels are associated with ceramic production in period II. The earlier, level 2, was founded on an artificial gravel deposit and consists of a large building complex with regular walls and rooms modified by the addition of a series of inner walls. A considerable change in organization is manifest in the subsequent levels, 1a and 1b. The architecture is less substantial, several isolated rooms are found, and discrete work spaces are created by low enclosing walls and benches. No architecture has been found in association with the kilns of period I. Only one period I kiln was excavated, because it had been dug into the collapsed remains of a period II kiln.

In period II, the kilns of area D produced Plain

Simple ware vessels, with large round-based jars and deep hemispherical bowls predominating. Two Euphrates Banded ware vessels were found in the debris of kiln 3, however, and it is possible that this ware was also being manufactured at Tell Banat. The material from the excavated period I kiln seems to continue the ceramic tradition of period II, with the addition of some new types, in particular jars with narrow necks and two tight loop handles high on the shoulder. Further analysis of the ceramics from area D will supplement these preliminary comments.

Evidence for domestic occupation was sought in a sounding in the northern part of Tell Banat, area F. Just below the surface, a pebbled street up to 2 m wide and running east-west was excavated in two 10 × 10 m squares. Built adjacent to the street on the north side were several rooms formed by irregular thin walls of small fieldstones. Ceramics indicate that this level dates to period I. Beneath these rooms, part of a large mudbrick structure was detected.

The presence of monumental construction, public buildings, and a ceramic industry at Tell Banat and Tell Banat North indicates that the complex belongs to a high order of settlement hierarchy and raises questions as to the nature of social and political organization at the site. Tell Banat may represent an autonomous state or perhaps a specialized component within a larger political system, in which case its function as a component may be cultic and perhaps mortuary. In future seasons we will address these issues.

Bazi. Berthold Einwag and Adelheid Otto, Deutsches Archäologisches Institut, Damascus, report:

In the spring of 1993, excavations began at Tell Bazi in the Tishrin Dam area.⁶ The fourth season was concluded at the end of October 1995. The site was occupied only during the Late Bronze Age, and there are no subsequent structures with the exception of a Roman fortress at the top of the citadel. Tell Bazi is located on the Jezireh riverbank of the Euphrates, at one of the few points where the valley widens to a large plain.

The site consists of a fortified natural hill, the citadel, and a lower town to the west. Various stone walls visible on the surface provided ideal conditions for the investigation of the site, which had two main goals. First, in the citadel area we examined the fortification system, buildings on the slopes of the hill

⁶ See B. Einwag, "Tell Bazi," *AJO* 40-41 (1993-1994) 228f; Einwag et al., "Tell Bazi—Vorbericht über die Untersuchungen 1993," *DM* 8 (1995) 95-124; T. McClellan and A. Porter, "Archaeological Surveys of the Tishreen Dam Flood Zone," *AAS* 39 (in press). We wish to thank Radwan Sharaf, Usama

al Sayasna (Deraa), Basam al Ahmad and George Dabboura (Damascus), and Tom McClellan, Anne Porter, Eva Strommenger, and Neil Crimes of the neighboring Tell Banat expedition for their assistance and support.

and on top of the plateau, the paths, and gates. Second, in the lower town, several stone walls could be traced on the surface and the floors of the houses lay just beneath the surface, providing the opportunity to uncover large housing areas and to reveal information about the planning of the town and the function of its various sectors. This study was assisted by the results of the first stratigraphic soundings, which showed that the lower town consisted of one building level constructed in two phases.

The citadel. The citadel lies on a spur of the mountain range bordering the Euphrates valley, separated from the mountains by an artificial ditch. Numerous stone walls covering the hillside were still visible on the surface and guided the investigation during the first two seasons. They turned out to be fortification walls surrounding the citadel on several levels, most of them serving mainly as retaining or terrace walls facilitating occupation of the steep ground. At the eastern slope of the hill the lowest wall, built of huge limestone blocks, was investigated over a length of 120 m. This wall is founded on one of the natural horizontal rock ridges and was constructed in several sections, some of which ended in a right-angle turn up the hill. The wall's primary purpose was the fortification of the citadel. A step trench was dug into the eastern slope in order to reveal information about the system of terrace walls. They are also built of unfinished limestone blocks and are filled behind with small stones and stone chips. Small buildings cover the slope of the hill in a steplike fashion, using the terrace walls as the back walls of the houses.

The plateau of the citadel was originally square and served as a stronghold; the northwest corner was later cut away for the installation of a huge open cistern. On the plateau we discovered parts of two large buildings, which, based on their plans and small finds, may be interpreted as official buildings: a *bit hilani* and a temple, separated from each other by a street. During Roman times the natural defense of the hillside and the still existing LBA fortification walls were used for the construction of a fortress to control the valley and one of the few crossing points over the Euphrates.

On the northern slope the access to the high plateau was investigated. A shallow depression in the surface leading up toward the citadel turned out to be the access route that was controlled by a gate halfway up the slope. Investigations revealed that this was built in several phases; the gate of one phase was strengthened by a bastion.

Lower town. Directly west of the citadel and adjoining it lies the lower town, measuring about 200 × 250 m (figs. 10–11). It was built on the natural grav-

el terrace of the Euphrates, only a few meters above the valley level. During the latest seasons the northern third of the lower town was completely excavated. A north-south trench was dug 100 m through the housing area.

The investigations conducted so far reveal that the lower town was planned and erected at one time. After approximately 100 years, it was completely destroyed and abandoned. An unexpected threat hit the inhabitants so suddenly that they apparently saved only their lives, leaving behind all their goods. This sudden event enables us to study not only the architectural remains but also to carry out a functional and social analysis of rooms and houses and the entire community.

The first excavations were started in the northeast; a second area was later opened in the northwest. During the last campaign both areas were connected, revealing an excavated area of more than 5,000 m². So far more than 20 houses have been completely or partially uncovered. The settlement is oriented along broad streets, 6 m wide, which were evidently the first part of the town to be built. The houses are often separated by narrow lanes that were accessible only to the neighboring occupants, as suggested by lockable doors at the entrance to the alleys. The ground plan and size of the houses follow a strict scheme, altered only during the second phase. The normal ground plan of a house consisted of a large main room with a row of three or four small square rooms arranged along the long side. Each measures about 10 × 15 m. The lower layers of the walls are built of limestone, and the upper layers of mudbricks. In the middle of the main room, an oval oven is often connected to a low working platform. The small rooms served as granaries and storage rooms and were mostly filled with large storage jars, some of which contained carbonized grain. Numerous metal objects such as weapons (including a complete dagger, 28 cm long) and tools (sickles, knives, and awls) were found in the houses. We found that manufacturing activity took place in the main room of the houses as well as in separate workshops. These main rooms thus served both as residences and as the site of small-scale industry. One household in the southwestern corner specialized in the fabrication of bronze tools; a variety of molds were found there, primarily made of limestone. A small steatite mold found in the same house also indicates the manufacture of jewelry using precious metals. In another building the production of hematite weights and stone or shell jewelry is suggested by the finished or partly finished objects as well as by the raw materials found there.



Fig. 10. Bazi. Lower town, northeastern area. Two domestic quarters separated by a broad street.

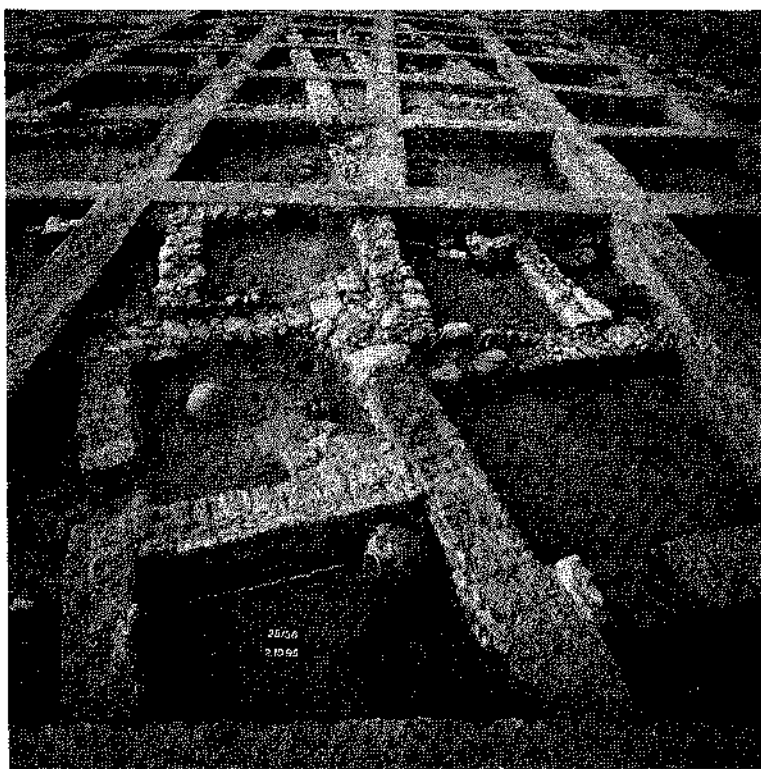


Fig. 11. Bazi. Lower town, northwestern area and adjoining corners of four houses.

A trench dug in the northeastern corner extending from the terrace down to the valley level shows that the lower town was not fortified. This suggests that the sudden end of this flourishing town may have been brought about by the attack of an enemy. The aim of the north-south trench was to reveal the borders of the lower town, but the southern boundary of the settlement has not yet been reached. The trench proved, however, that throughout the settlement there existed only two phases. The next campaigns will concentrate on uncovering the southern parts of the lower town.

Beydar. Marc Lebeau, European Center for Upper Mesopotamian Studies, reports:

The Euro-Syrian Excavations at Tell Beydar (formerly the European Archaeological Mission in Syria) are organized by the European Center for Upper Mesopotamian Studies in coordination with the Directorate General of Antiquities and Museums, Damascus.⁷ The European universities participating in the Center are the Katholieke Universiteit Leuven (Karel Van Lerberghe), Westfälische Wilhelms-Universität Münster (Joachim Bretschneider), Universidad autónoma de Madrid (Fernando Valdes), Université libre de Bruxelles (Philippe Talon), and Université de Lille III (Dominique Parayre).

Tell Beydar is a circular 28-ha third-millennium city, with a diameter of 600 m, defended by a city wall with seven gates. A lower town (Beydar II) of 30 ha was built in the Mitanni period, then abandoned and later rebuilt in Neo-Assyrian times. A few hundred meters south of the third-millennium city is an area occupied during the Hassuna, Halaf, and Ubaid periods (Beydar III), identified by Antoine Suleiman.

The important "Kranzhugel" city of the third millennium has been exposed in several operations. Sector H is located at the northern gates of the city, where the city wall was partially destroyed by Early Dynastic II and III tombs. The interior side of the city wall had small houses and workshops of ED I date that indicate the age of the ramparts. Sector G on the north flank of the upper city is a step-trench that exposed three levels of Seleucid occupation, under which are several levels of ED III and ED II domestic structures. There is evidence for an interior rampart ca. 5 m wide.

In sector E on the west side of site, we exposed a Seleucid level, under which was an ED III official building measuring 26 × 7.5 m. This building consists of four square rooms of identical dimensions with an entrance on the west facing toward the interior of the city. Two floors for this building have been identified. Associated with the upper floor, at the rear of the building, was a small ED III private residence.

In sector F on the acropolis, under a Seleucid level and two levels of Akkadian occupation, we uncovered a large ED III building, probably a palace (fig. 12). This palace was rebuilt in late ED III, but the rebuilding followed most of the earlier plan. The original ED III palace was constructed of white baked brick and had 17 or 18 rooms and a courtyard, all with floors covered with thick plaster. This is a rectangular building, 32 × 21 m, with an entrance in the middle of the east facade. The building conforms to the architectural traditions of contemporary southern Mesopotamia. The ED IIIb reconstruction replaced half of the destroyed or damaged walls of the earlier building while preserving many white brick walls of the first phase. Some doors were blocked, and some walls were opened. In general the architecture is considerably poorer than that of phase I. Four tablets were found in the second ED III occupation phase.

In sector B, we found an ED III domestic quarter under Hellenistic house foundations. No complete house plan is yet available, but partial plans of six or seven houses have been exposed. In 1993 and 1994, under the original floor of one house, 140 tablets were retrieved (fig. 13). The associated ceramics are ED IIIb. Also contemporary with these are two tablets from sector E, four from sector F, and one from the lower town. F. Ismail, H. Hammade, W. Sallaberger, K. Van Lerberghe, and P. Talon are responsible for the decipherment and publication of the Beydar tablets. The 147 Beydar texts are contemporary with those from Ebla, Mari, Abu Salabikh, and Fara.

The lower town (Beydar II) was tested in sector J and an associated sounding. Here walls of a Neo-Assyrian residence with baked brick foundations were exposed. On the floor of this residence were numerous sherds of Nuzi ware. Although damaged

⁷ The Tell Beydar excavation is a Syro-European project sponsored by the Directorate General of Antiquities and Museums, Deutsche Forschungsgemeinschaft, Vorderverein Tell Beydar and its sponsors, Nationaal Fonds voor Wetenschappelijk Onderzoek, Fonds national de la recherche scientifique (Belgium), Onderzoeksraad K.U.

Leuven (Belgium), Université libre de Bruxelles, Med-Campus Program 95 (European Union), Petrofina (Belgium), Société générale de Belgique, Ministère des affaires étrangères (France) (1992-1993), Commission nationale des fouilles (France) (1992-1993), European Center for Upper Mesopotamian Studies, and private donors.

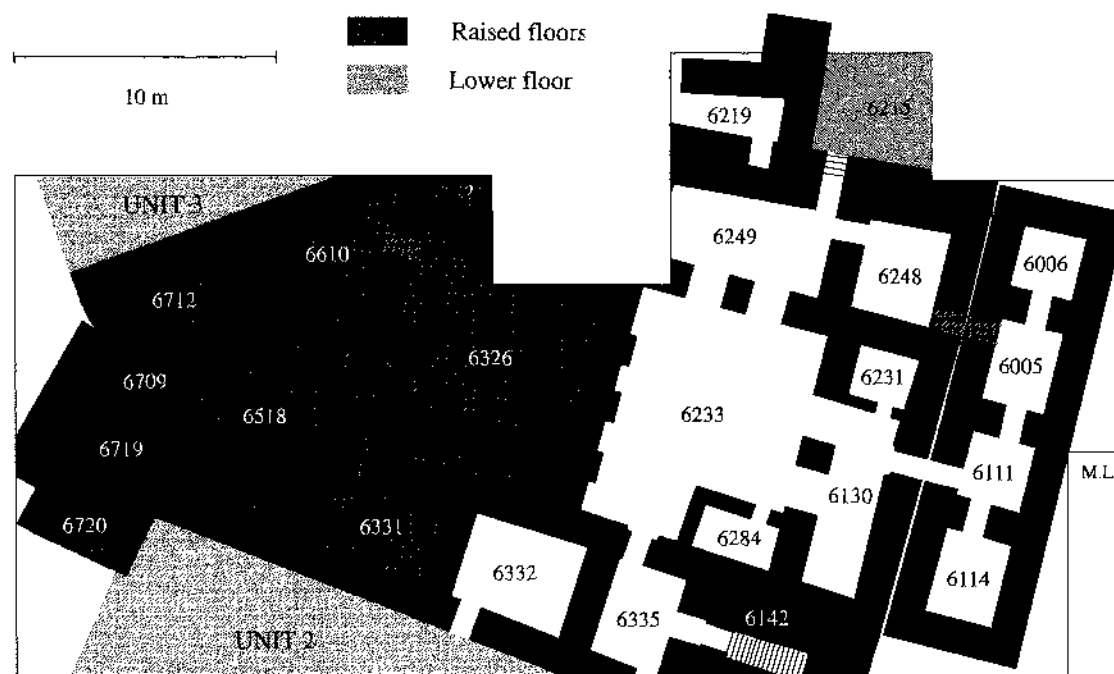


Fig. 12. Beydar. Plan of acropolis, sector F, unit I. Early Dynastic III official complex, phase 2.

by the Neo-Assyrian foundations, there are traces of a small Mitanni-period house, a silo, and additional residences. A contemporary child's tomb contained an ivory box with animal decoration; other ivory objects were also retrieved in 1995.

Bi'a/Tuttul. Eva Strommenger, Museum für Vor- und Frühgeschichte, Berlin, reports:

In the spring of 1995, we completed operations begun in 1980, and we plan to publish these results before resuming work in this area.⁸ During recent excavations we concentrated our efforts on the central mound of the city, which revealed public buildings with secure stratigraphy. We did not reach sterile soil, and it appears that several more levels remain to be excavated.

At the southern end of the central mound, and also in the middle for the later periods, we have several clearly identifiable levels, which are discussed in chronological order. First, the remains of an apparently well preserved and solidly built public building may be a palace. We only exposed one room in its entirety. On the south side of the room is a street, and across this street we also found solid masonry buildings. These structures probably belong to an early phase of the Early Dynastic period.

In the next level, we excavated four aboveground

tombs belonging to rulers of Tuttul, and also exposed the southern walls of two similar tombs that extend into the center of the mound (fig. 14). The plan of these tombs is rather uniform: a doorway in the eastern wall leads into a narrow middle room, at the end



Fig. 13. Beydar. Early Dynastic III cuneiform tablet.

⁸ The first volume, by Kay Kohlmeyer and Eva Strommenger, concerns the burials and is in press. Tablets and sealings will be published in the second volume of this

series by Manfred Krebernik and Adelheid Otto. Annual reports and preliminary studies have also been published in several volumes of *MDOG* (109, 113-19, and 121-27).

of which doors lead both north and south into large rooms. The northern room is larger and has wall niches. Tomb 3 to the east had a high stone foundation and a stone pavement beneath the floor, as did the single-roomed tomb 5, which is attached to tomb 3 at the southern end. The tombs were separated by an alley running north-south, and were apparently built over time, the northern ones being the earliest. We therefore assume that the tombs were built on demand for the not yet excavated palace still within the tell. Considering this likely connection to a palace and the actual plan of the tombs, we see a striking similarity to the cemetery at Ur, although the tombs at Ur are subterranean and the palace has also not yet been excavated. The tombs contained human and animal bones, jewelry, and large assemblages of ceramics. Remains of furniture with inlay were found in the main rooms, but all grave goods had been disturbed by robbers in antiquity who apparently entered through gaps in the outer walls. This looting had to have taken place before the upper parts of the tombs were leveled for new construction.

In the next level, we clearly have a palace (fig. 15). The excavated portion on the southern face of the central tell has a stone stairway along the slope, but the southernmost part of the stairway has disappeared due to erosion. Excavations took place around a graveled courtyard surrounded by open halls or rooms indicated by the remains of wooden posts. Wood was also used for thresholds and as structural support for walls. In the eastern room or hallway, close to the entrance to the main room, a wooden stand was found where many simple ceramic bowls were ready for use. The main room itself had at least one wooden pillar on a stone base that was additionally raised by a two-tier stone threshold. At the western outer wall we found two baths. This palace was destroyed in a fire, and its contents were found largely in situ. These consisted mainly of simple, ordinary ceramics of which one deserves mention: the lower part of a two-handled jug of the *depa amphikypellon* type, which indicates trade with Anatolia. The plan and building style of the palace share definite similarities with Palace G at Ebla, and a beautiful fragment of a relief found in the debris shows the beard of a composite figure that also resembles examples from Ebla, all of which suggests that this level is of comparable date.

Before the final catastrophe of the Burned Palace, a workshop was constructed to the west with an outer wall fortified by pillars. Only a minor part of this building's eastern perimeter was excavated, but the far wall is visible under certain lighting conditions

on the adjacent southwestern slope of the tell. This Pillar Building was untouched by the fire and continued to be used through later periods. Two clay sealings were found, both in Akkadian style. Contemporary with this building, simple mudbrick constructions were built in the open area to the east, and after the Pillar Building passed out of use, the building area was also filled with these constructions, which consisted of several bread ovens, kilns for firing ceramics and terracotta figurines, a large silo, and many richly furnished tombs.

In the subsequent level, the deep foundation trenches of another palace were evident. This palace was probably planned in the Shakkanakku period, but for unknown reasons mudbrick was laid up only to a certain height, and the palace remained unfinished. After a brief interruption the palace was finished, based on the same ground plan. This complex reminds us of the palace at Mari and could be described as a smaller, more modest version. An entrance hall and a large courtyard were traversed in order to reach a rectangular audience hall with a throne on the short eastern wall and benches for the visitors on the longer sides. Behind this space was a large room with a small, cellar-like side room to the east. A complex of buildings that could represent a private residence was situated in the northwest corner of the palace. After a rather short period of use this public building was abandoned and fell into disrepair. During the time of Shamshi-Adad/Yasmah-Adad the ruins were cleared, and a new, differently organized complex was built over the remaining foundations. Doorways were added, cut through previously impassable walls. The building lost its public function and was used for workshops and administrative purposes. Many sealings were found bearing the name Tuttul, the ancient name of Tell Bi'a.

Over this later period of the palace, many levels were found containing only simple private houses, indicating the decline and eventual demise of Tuttul sometime during the mid-second millennium BC. Two thousand years later a monastery was built on the abandoned ruins. It contained three impressive and well-preserved mosaic floors, two of which can be securely dated to the sixth century A.D. due to their Aramaic/Syriac inscriptions. The length of occupation of the monastery has yet to be determined, but the modern name of the site, Tell Bi'a, means tell of the monastery. The only Islamic remains recovered are the corner of a building and a number of graves.

Bosra. P.-M. Blanc and J.-M. Dentzer, Centre national de la recherche scientifique, Paris, report:



Fig. 14. Bi'a. View from the north of the tombs of the rulers of Tuttul. In the center are the fully excavated tombs 3 and 4.



Fig. 15. Bi'a. The eastern hall of the Burned Palace with a stepped stone threshold at the entrance to the main room. In the doorway are remains of the mudbrick collapse.

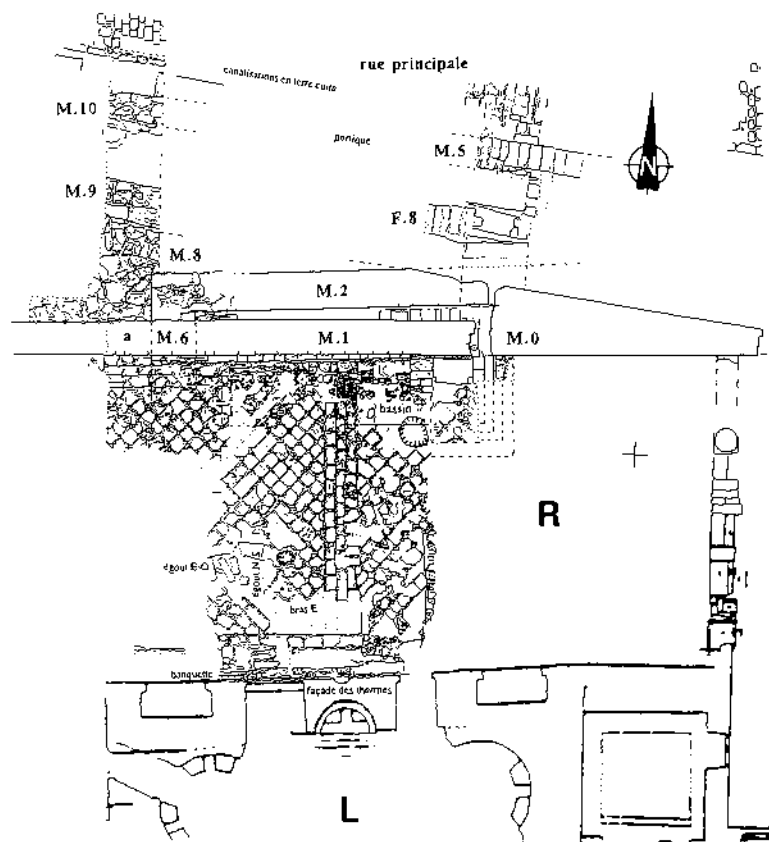


Fig. 16. Bosra. Baths.

The 1995 campaign was devoted to studying ceramic material and the preparation of publications. Toward this end, excavation, cleaning, and complementary soundings took place at the southern baths. This permitted continued study of the zone situated between the facade of the baths and the principal east-west street (fig. 16).

Area R, situated to the north of octagonal room L, was reexamined in 1994 by a sounding against the wall to the north. It was therefore possible to study the relationships among the different structures associated with the baths. Wall M.2, which we had supposed was stopped at the north by the baths in their first stage and which had been dated to the second half of the second century, presents a turn to the south before attaining alignment with the western limit of room L. This wall, 1.76 m thick, was built of large blocks of possibly redressed basalt. One block measured more than 1 m in height and length. The wall seems to have terminated at the west in a series of three blocks, which had perhaps extended the wall and aligned it with the early facade of room L. Against the southern face of this wall was a large basin, 12 × 4.5 × 1 m, bordered by three steps on

the west, east, and south. The steps are built of limestone slabs with a strong mortar.

These walls, M.2 and M.3, resting directly upon the basin, belong to the original plan of the bath, and are associated with a section of floor with material that furnishes a terminus ante quem toward the middle of the second century. Within the fill of the west part of the basin was a great quantity of roof tiles, suggesting that this area was covered. An alignment of stones uncovered to the south of the basin could be interpreted as a supporting wall for a level further south, or, more likely, as the remains of a structure protecting water channels.

Wall M.6 was rebuilt in this same phase and the associated floor was paved with thick slabs of beige limestone. The wall, dated to the end of the fifth or the sixth century, served to delimit the north side of the bath. A bench was set against the facade of room L, cutting the limestone paving.

A system of drains was found near room L. They were well constructed, perhaps at the moment when this room was transformed into an octagonal heated room with a central octagonal basin. One of the branches of the drain came out from this room to

the north. At 5 m from the facade it bifurcated at a right angle to the west. Apparently this drain received a conduit from the east, without doubt a bit older. The north facade of octagonal room L was remodeled during the Byzantine epoch.

The fragmentary state of the slabs near wall M.1 and the facade of room L suggest that the blocks fell from a height. The pavement was removed immediately thereafter, in the Late Ommayyad period, in order to pave other sectors, or perhaps to be converted into chalk, a material particularly precious in a basaltic zone. To the north, within the thick mortar that supported the limestone paving, we found two parallel cavities (ca. 0.5 × 0.5 m). We suppose that they are the remains of heating elements. A period of abandonment at the end of the Late Ommayyad epoch left an accumulation of cinders, perhaps from baking activities, on the substructure of the pavement and within the heating cavities.

As a result of this excavation, the construction of the baths may be securely dated to the middle of the second century; the limestone paving documents a new program of ambitious construction within the baths in the fifth century.

A new trench was opened in 1993 between wall M.1 and the principal axis of east-west traffic in Bosra. Work in 1993-1994 permitted the establishment of a chronological sequence of occupation and structures in this quarter. It has revealed, apart from traces of earlier occupation (flint and pre-Roman ceramics), some Nabataean remains and floors situated at a higher level, south of the street.

Porticos of the Roman period were modified at a later date in the Byzantine period. A drain system of baked clay perhaps belongs to this period. In the Ayyubid-Mamluk period, the sector was transformed by the construction of shops, a market, and a small drainage channel alongside the street. In 1995, we located in a parallel trench the end of wall M.2 and minimal traces of Nabataean floors, without, however, determining the orientation of the street during this period. This zone was modified in the Islamic period.

Brak. Roger Matthews, Cambridge University, reports:

A new program of excavations at Tell Brak in north-eastern Syria began in 1994 and continued in 1995.⁹

Previous work at the site has established its great importance, particularly during the Late Uruk and Akkadian periods. The aim of the new project is to place these important results within a broader framework by investigating material remains from a wide range of periods. Research has focused on areas of Middle Uruk, Ninevite 5, Akkadian, and early second-millennium date. In all these operations we are conducting a program of contextual analysis to investigate a full range of urban contexts at Tell Brak and at the Bronze Age site of Kilise Tepe in Turkey. Roofed rooms, courtyards, streets, rubbish dumps, and cesspits are being sampled in order to understand better the use of space in ancient urban environments. We have undertaken systematic wet-sieving and flotation of remains from all types of contexts. The analysis of recovered materials, including botanical and faunal remains, lithics, and pottery, is being fully integrated with micromorphological studies.

Middle Uruk investigations. Pottery of the Middle Uruk period, dating to the mid-fourth millennium, is found at almost all points along the mound's skirt, as well as in the fields beyond the main mound, suggesting that the settlement of Tell Brak and adjacent mounds was at its greatest extent during the Middle Uruk, although doubts remain about the nature of early occupation in the unknown heart of the mound. So far we have conducted limited excavation of Middle Uruk levels, exposing parts of a building in trench HSI near the base of the large HS spur on the north-western edge of the mound. Finds include typical Middle Uruk pottery, including fine wares, and much flint and obsidian. Most significantly, however, we recovered a collection of clay sealings bearing impressions of cylinder seals, some depicting processions of human figures. These sealings are among the earliest securely stratified evidence of the use of cylinder seals anywhere in the Near East. Additional sealings with cylinder seal impressions have been found in association with Middle Uruk pottery on the surface of a large mound in the fields to the north of the main mound.

Ninevite 5 investigations. The Ninevite 5 period, covering much of the first half of the third millennium, has remained little understood in this part of northern Mesopotamia. Areas of Ninevite 5 oc-

⁹ Funding was provided by the British School of Archaeology in Iraq, the McDonald Institute for Archaeological Research, University of Cambridge, and the British Academy. Contextual analysis was funded by the Leverhulme Trust. For reports of the 1994-1995 season, see R.J. Matthews, "Imperial Catastrophe or Local Incident? An

Akkadian Hoard from Tell Brak, Syria," *Cambridge Archaeological Journal* 4 (1994) 290-302; Matthews, W. Matthews, and H. McDonald, "Excavations at Tell Brak, 1994," *Iraq* 56 (1994) 177-94; and Matthews, "Excavations at Tell Brak, 1995," *Iraq* 57 (1995, in press).

cupation have so far been investigated at three widely separated points on the mound. Our most extensive information has again come from the large HS spur, where surface operations have indicated an occupation spanning Early Uruk to Late Akkadian. The earliest Ninevite 5 levels were excavated in trench HS2 where a courtyard and adjacent rooms were exposed. Cut through this level was a series of pits with burnt fill from which we recovered Early Ninevite 5 pottery, including a rare painted chalice, and over 120 clay sealings with cylinder seal impressions, mainly affixed to baskets and pots. Further up the HS spur we exposed additional Ninevite 5 occupation in trench HS4. Here the earliest excavated occupation consists of a large building with multiple plaster floors overlaid by carefully packed bricks in two distinct blocks, one orange, the other gray. This building is of very early Ninevite 5 date, roughly contemporary with the pits and clay sealings from trench HS2.

Above this building a major change in the use of space takes place, coinciding with the first appearance of true incised Ninevite 5 pottery. Rooms are located adjacent to a courtyard where seven levels of deposits were excavated, spanning the entirety of the incised and excised pottery phases of Ninevite 5 occupation at Tell Brak. In the courtyard deposits, much of the pottery consists of cooking wares with some finer incised vessels. Of the adjacent rooms only the two uppermost levels have so far been excavated. The lower of these phases comprises a well-constructed building of some substance, with a doorway and a plastered niche. Pottery from this phase includes excised vessels. From above the floor of one room we recovered 350 clay sealings, bearing impressions of only five different cylinder seals (fig. 17). Designs comprise ladder motifs and animals, including a porcupine. In contrast to the Early Ninevite 5 sealings from HS2, these Late Ninevite 5 sealings show evidence of consistent and repetitive door sealing, suggesting the exercise of control over access to storage rooms. The upper phase of these rooms yielded a good assemblage of very late Ninevite 5 pottery, mainly of excised style, in association with Metallic ware. Above these late Ninevite 5 structures there is another marked change in the use of space, with buildings on new alignments dating to the mid-third millennium B.C.

In area HF, a large spur at the northeast of the site, we have also investigated Ninevite 5 levels resting above the Uruk deposits that form the bulk of the spur. Parts of two main buildings were excavated, the lower one containing a series of rooms with a good sequence of plastered floors and steps. Late



Fig. 17. Brak. Late Ninevite 5 clay sealing from trench HS4.

Ninevite 5 pottery was recovered, including fenestrated stands and vessels decorated in a strange excised style. The upper building had bins, a plastered floor, and large quantities of bird bones in an ashy deposit on the floor, suggesting use as a kitchen. Pottery from this building included large jars, small cups, and a distinctive painted stand, dating to the very end of the Ninevite 5 period or slightly later. Finally, in excavating area HL, a broad shoulder on the south of the mound, we identified three phases, the lowermost consisting of a room with burnt fill from which came an incised jar with a possible protoliterate sign on one panel. Our work on these levels has thus established that Tell Brak covered at least 20 ha in the Ninevite 5 period. The existence of sophisticated administrative practices, especially the intensive use of door sealing, suggests a social and economic complexity previously not attributed to communities of this date.

Akkadian investigations. Excavation of Akkadian levels has proceeded in two areas. The first, area HP, is a low spur at the western extremity of the mound, largely made up of an enormous mudbrick structure directly overlying a mound of late fourth-millennium date. The large structure, measuring at least 29 × 8.5 m, consists of carefully laid bricks, whose size and arrangement suggest an Akkadian date. Against the south face of this enigmatic structure a series of rooms was constructed in the Akkadian period. From the floor of one room, with a plastered pentagonal feature, came a fragmentary Akkadian inscription on a clay sealing. To the west of these rooms there was a massive buildup of burnt rubbish deposits from which we recovered 277 clay sealings with 52 different designs of seal impressions. Scenes include banquets, chariots, contests, and a range of

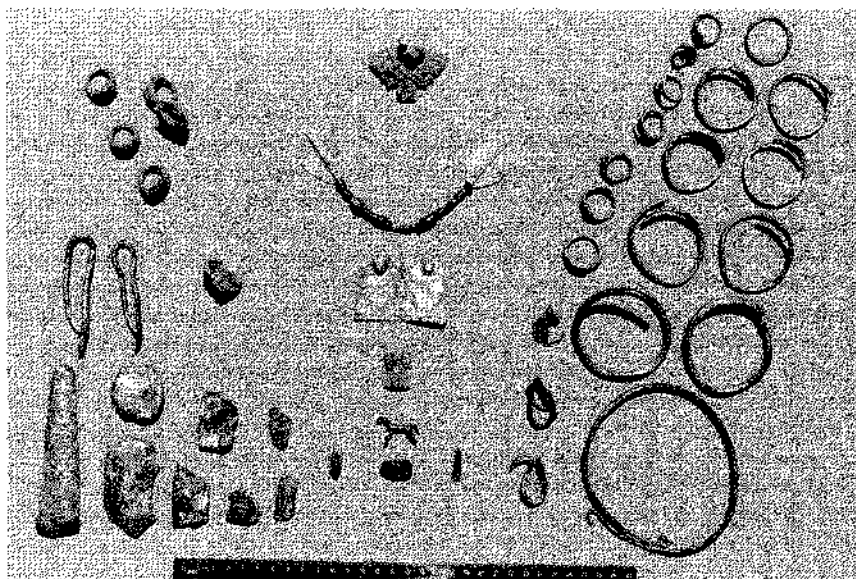


Fig. 18. Brak. Akkadian hoard from trench HS3.

animals both mythical and real. The entire HP complex appears to be part of the elaborate Akkadian administration of the region already well attested from previous investigations at the site.

Akkadian levels were also excavated in trench HS3 near the summit of the HS spur in the course of reaching the levels below. Phase 2 in this trench comprised a courtyard with an adjacent suite of two rooms with baked brick floors, an unusual feature at Tell Brak. At the point where a subfloor drain passed through the exterior wall of one of the rooms into an adjacent alley, a large white stone covered two pots set into a hole in the floor packing. The lower of these contained a unique collection of precious items deliberately buried as a hoard (fig. 18). These were primarily silver objects, including ingots and circular or spiral lengths of rod known as an early currency, but also included a well-carved Imdugud/Anzu figure with a lapis body and frit and sheet gold head, and a gold plaque showing crossed lions with fine incised detail. Below phase 2 we excavated earlier Akkadian and pre-Akkadian levels that have been stratigraphically connected with the underlying Late Ninevite 5 occupation of trench HS4, thus completing an important cultural sequence spanning much of the third millennium.

Earlier second-millennium investigations. A major aim of our work is to explore occupation at Tell Brak following the collapse of Akkadian rule in the region, and to this end we have been excavating building levels from the early second millennium prior to investigating the levels below, especially in area

HN near the summit of the mound. Here we have excavated four phases of a large building with carefully plastered rooms and internal features. Painted pottery indicates a date in the earlier part of the second millennium. From one level came a distinctive bifurcated vertebra believed to belong to a humped Zebu cow. Elsewhere, near the summit of the HS spur, cesspits probably of early second-millennium date have been excavated and intensively sampled, yielding new and important information on diet and environment in these little understood centuries after the demise of Akkadian rule. Next year, work will continue on levels of immediately post-Akkadian date in area HN, as well as in all other parts of the site discussed above.

Ġindaris. Muhammad Khadour and Antoine Suleiman, Directorate General of Antiquities and Museums, Damascus and Dietrich S  renhausen, Universit  t Konstanz, report:

Since 1993 a Syrian-German mission has carried out three seasons of survey work and archaeological excavations in the western Afrin valley. The valley is situated immediately north of Jebel Sim'an some 50 km northwest of Aleppo. Geographically and culturally, the valley is part of the plain of Antioch, modern 'Amuq, which played an important role in relations between inland Syria and the eastern Aegean world and provided access to the inland trade routes that connected Egypt and Palestine with Anatolia as early as the fourth millennium B.C.

The main objective of work at Tell Ġindaris was to clarify the material culture of the region from

the second millennium B.C. through classical times. The mound at Tell Ġindaris sits 5 km from the river, covers an area of approximately 20 ha, and rises 20 m above the plain. Previous archaeological investigation in the 1930s by the Oriental Institute (Chicago) suggested an occupation stretching from the Halaf period to the sixth century A.D.

There can be little doubt that the site's name during the Hellenistic-Roman period was Gindaros, a place briefly described by the ancient geographer Strabo. For the early first millennium B.C., a tentative identification of the site with Kinalua, capital of the Neo-Hittite kingdom of Pattin, derives from the annals of Assurnasirpal II. During the second millennium B.C., the site probably belonged to the kingdom of Mukish.

Between 1993 and 1995 three areas of the mound were investigated. In area I, which is located on the northeastern summit, 2,000 m² were exposed. In contrast with the low number and poor quality of small finds, the architectural and stratigraphical evidence is of some importance. For the first time since the American excavations took place in the plain of Antioch some 60 years ago, a sequence of building levels ranging from the middle of the second millennium B.C. to the Early Byzantine period can be established in this region. Dating was based on ceramic finds, and also coins from the Late Roman and Early Byzantine periods. Stray finds of medieval Islamic pottery may indicate an occupation of the site, but no architectural remains from this period have been discovered.

From the Early Byzantine period a sequence of four major building levels is preserved. The latest levels, 1 and 2, consisted of small private houses. Levels 3 and 4 contained the stone foundation walls of a large building complex, the northern part of which is now eroded. It seems that it was built around a large courtyard of at least 450 m². The southern limits of this complex have not yet been traced. Finds of pottery, oil lamps, and coins support a date for all Byzantine levels within the sixth century A.D.

The fill below these buildings was brought in from a distant area of the mound. It contained numerous potsherds, glass fragments, and oil lamps dating to the Late Hellenistic period (ca. 100 B.C.). This date is also affirmed by a few coins and an almost complete terracotta relief bust of Dionysos. The fill covers an ancient slope where a few remains of Late Roman walls came to light, datable by Roman Imperial coins (ca. A.D. 260–330).

Two earlier phases date back to Neo-Assyrian and Late Hittite/Aramaic times. Both consist of badly pre-

served domestic buildings and numerous disposal pits that were dug into the ancient slope. While the earlier phase yielded plentiful painted pottery, including LH IIC imports and local imitations, the later phase is characterized by the increase of red-slipped bowls and a few fragments of Late Geometric imports. A span of time from ca. 1100 to 600 B.C. seems likely for these phases, although little building activity is documented.

This pattern stands in marked contrast to the architectural evidence from below the slope's surface, where the remains of two superimposed, monumental buildings were discovered. The stone foundation walls of the upper building are 3.4 m thick, and they surround a room with a thick lime-plastered floor. Some 40 m further west a glacis-like mudbrick terrace, perhaps part of this complex, runs parallel to the northern wall of the building. If the terrace is associated, the entire building measured at least 65 m in length. Pottery finds from above the floor indicate a late MB-LB date (ca. 1600–1200 B.C.). The forerunner of this building was traced below its northern corner, where the buttressed outer facade of a mudbrick wall resting on a massive stone foundation came to light, and in a small sounding dug in the southern part of the area, where a column base set on a solid lime-plastered floor was exposed. The base, which is made of basalt and has a diameter of 1.6 m, was probably part of a gate or doorway. Pottery finds give a MB I or II date for both the corner and the column base (ca. 1900–1600 B.C.). A third monumental building some 100 m away was destroyed by later pits, but is dated by ceramics to the MB I period.

The steep western slope of the mound and its northwestern summit are surrounded by a fortification wall with solid stone foundations. It runs approximately 325 m to the north and 100 m to the east, on a level 7 m lower than the foundations of the MB-LB building in area I. Two steep trenches in area III provided a 10-m sequence of Byzantine to Iron Age levels lying above the wall. The wall itself is 8 m thick and probably Middle or Late Bronze Age in date, making it likely that at least during the second half of the second millennium B.C. the settlement at Ġindaris was a fortified town surmounted by an acropolis in the northeastern part. By 1200 B.C., the acropolis must have lost its former importance. Only further excavation can show whether a new center was built in the northwestern part of the mound, which would be expected if an identification of Ġindaris with Iron Age Kinalua is correct.

Gudeda. Michel Fortin, Université Laval, Quebec, reports:

The Canadian expedition conducted a fourth and final campaign at Gudedā¹⁰ in 1993, concurrently with excavations at Tell 'Atij. Work was concentrated in two areas. The first, located on the northern edge of the tell, continued the 1992 excavations. In a previously uncovered square room with thick mudbrick walls, we removed half of the plastered floor in order to reach another floor some 30 cm lower. A small test trench was sunk below this second floor level in order to expose the wall foundations and reach the layer underneath the walls. The material from this test will provide us with a *terminus post quem* for the room's construction. Another smaller room nearby was further defined, and an oven and other installations were uncovered. The most interesting discovery in this area, however, was a 1-m-wide cobbled alley that ran along a wall of the room just mentioned and continued for 7 m before turning at a right angle northward and ending after a few meters due to erosion. Sections made at two different points across this alley showed that it consisted of at least three layers of cobbles, an accumulation 80 cm deep resulting from constant resurfacing. On the other side of this alley a series of plastered basins exposed in 1987 and 1988 were removed in 1993 in order to explore their construction. After excavating a meter of debris, we came upon several superimposed plaster surfaces. Nearby we found more modest installations that had been destroyed by erosion, and their function remains elusive.

In sum, the excavation of these four aligned 5 × 5 m squares on the northern edge of the tell did not reveal much due to the effect of erosion in this sector. Nevertheless, the southern balks of the squares, in places almost 2 m high, gave us a stratigraphic section that supplemented the one produced by a deep sondage opened in 1987 along the steep northern flank and shaved down in 1993. We were thus able to draw a section showing the entire stratigraphy of the site in the north. We hope to link the stratigraphy of this northern section to that visible in the balks of six aligned 5 × 5 m squares dug along the gentle southern slope of the tell. As the northern and southern trenches are located along the same axis, we now have a master section across the entire tell from north to south.

This long southern trench was our second main area of excavation at Gudedā in 1993 (fig. 19). A succession of layers were sampled to identify vegetal remains, but otherwise few structures were uncov-

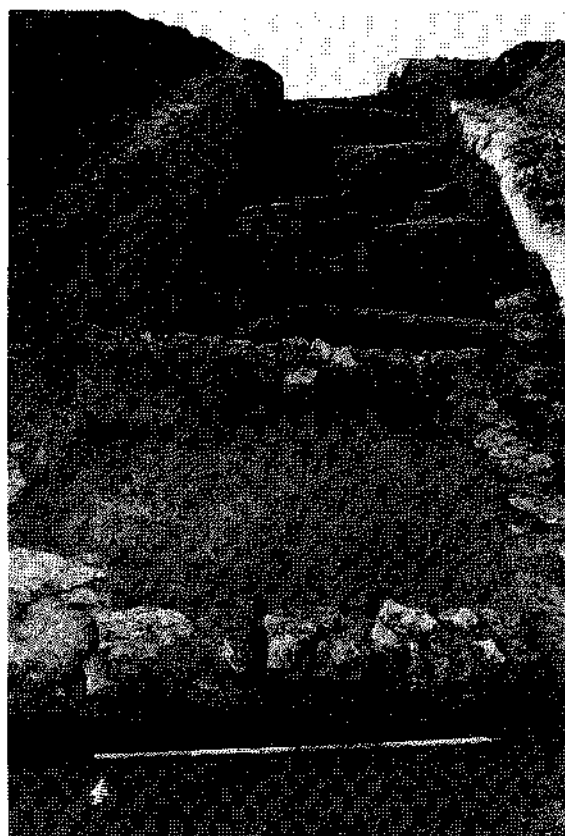


Fig. 19. Gudedā. Trench along southern flank.

ered, and due to the limited area of excavation, they were difficult to interpret. Nonetheless, a square room with stone walls laid on sterile soil was unearthed at the bottom of this trench, indicating the extent of occupation in the south. Finally, great quantities of sherds collected in each layer will allow us to prepare a typology of ceramics at Gudedā and to trace its evolution in relation to the stratigraphy. This pottery will also be useful for dating the site, the occupation of which covered the end of Ninevite 5 and perhaps the beginning of the Akkadian period.

During May 1994, Michel Blackburn (Soil Department, Université Laval), undertook several operations in the field to understand better the natural components of the tells at 'Atij and Gudedā. Ten trial trenches, 1 m³ each in size, were opened along a transect across the middle Habur valley where both tells are located; sedimentary layers were described and sampled. Palaeosols from 'Atij and Gudedā were also sampled, and additional samples were taken from the levels still visible in section at 'Atij. Thin

¹⁰ This and previous seasons were subsidized by the Social Sciences and Humanities Research Council of Canada. A substantial preliminary report appears in M. For-

tin, "Rapport préliminaire sur la cinquième campagne à Tell 'Atij et la quatrième à Tell Gudedā (Printemps 1993)," *Syria* 72 (1995) 23–53.

sections were made from mudbricks from 'Atij and examined to compare their composition from one level to another. Finally, stone fragments were also gathered from several areas near Hasseke in an attempt to pinpoint the provenance of the raw material used for tools.

From mid-May to mid-June 1994, Fortin and a graduate student conducted a study season to complete the description of antiquities to be deposited in the National Museum at Deir ez-Zor, thus closing the operations in the field at Tell Gudeda. Various analyses are now underway as part of the production of the final report.

Hamman al-Turkman. Diederik Meijer, Leiden University, reports:

The seventh campaign of excavations at Tell Hamman al-Turkman took place between 1 May and 26 July 1995. Work concentrated on the MBA administrative complex on the summit as well as on the separate settlement at the extreme southern foot of the mound, which also dates to the Middle Bronze Age. We continued work in the same areas opened in 1992 (the sixth season), when the dual character of habitation at the site was established.

During both the 1992 and 1995 seasons, excavation of the administrative complex on the western summit of the tell (squares K-L 22-23) yielded cuneiform tablets and sealed bullae. The former included a Mari-style economic text fragment, and the latter Old Babylonian-style as well as provincial Cappadocian-style sealings (fig. 20).

The complex's earliest phase has been reached. Previous work in adjacent squares had revealed that the first, MBA occupation consisted of domestic structures of a rather modest character; this proved also to be true underneath the foundations of the complex. It is clear now that immediately after this initial, short-lived early MB phase of domestic architecture, the site was chosen for the important building that survived, with some alterations and modifications, throughout the Middle Bronze Age. It is also clear that a major part of that building has disappeared in the erosion of the western and southern sides of the summit. Furthermore, it is in this area that an EB forerunner of the MB complex must have been destroyed in a conflagration followed by a short hiatus; a layer of gray and red ash with charcoal and mixed EB and MB sherds forms a wedge between the EB and MB levels. The thin end of this wedge lies under the MB complex, while the thick end lies to the west-northwest, suggesting that the structures that produced the destruction debris were located in that area.

The MB complex retained its form for some 300

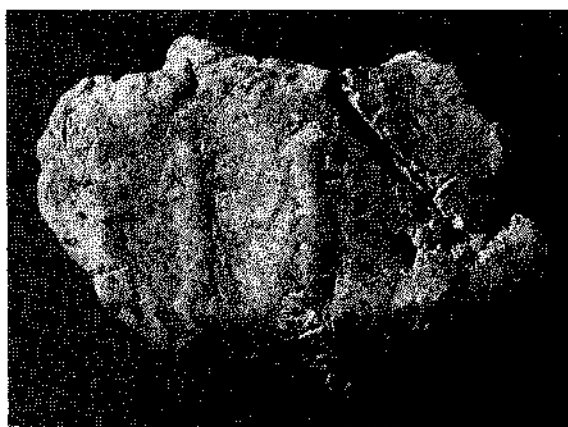


Fig. 20. Hamman al-Turkman. MB I unbaked clay sealed bulla from administrative complex.

years. A northern protective wall shielded a mainly east-west building with several interconnecting rooms. These contained, throughout the various phases, installations such as a silo and terracotta pipes to channel rainwater to wells. The wells (two of which have been excavated) were cylindrical holes lined with large, superimposed pottery cylinders (diameter between 55 and 64 cm), reaching depths exceeding 5 m.

The massive mudbrick substructure of what we interpret as a tower emphasizes the function of the complex as a stronghold (which was also clear from the glacis found in 1988). A double entrance to a larger room must have been guarded, since a small cubicle nearby contained broken bullae, presumably from door fastenings. Twelve of these bulla fragments were sealed; elsewhere in the complex, a complete bulla was found with two sealings of the same provincial Cappadocian-style seal. These finds augment those made in 1988 and 1992, including other seals and their ancient impressions. Together with the few fragments of text that were excavated, including an ancient dictionary, these sealings reflect the administrative character of the building. This function was retained throughout its history, and is evident in several parts of the complex.

Work in the separate southern settlement was extended to four operations totaling 300 m². The removal of large quantities of overlying debris, however, dating to our period X (the Parthian, Roman, and Byzantine periods), made for slow progress. Well-preserved evidence of MBA occupation, consisting of burnt domestic architecture, was protected by a 3-m-wide mudbrick wall with buttresses. The wall contained a curious opening extending down vertically and then bending north, whose function so far is entirely unclear. After this wall had fallen into dis-

use, several young individuals were buried in the area before reoccupation took place. The pottery associated with these inhumations yields rather dependable synchronisms with some burials on the summit dating to the beginning of the MB II period: identical pots were found.

Future seasons will concentrate on the form and function of the dual occupation at Hammam al-Turkman by extending and deepening especially the southern operation. Karum-like settlements or not, these physically separate but exactly contemporaneous settlements present a most interesting opportunity to test various hypotheses concerning economy, hierarchy, and social relations in Syria during the Middle Bronze Age.

Jerablus-Tahtani. Edgar Peltenburg, University of Edinburgh, reports:

The third and fourth seasons of University of Edinburgh investigations at Jerablus-Tahtani, a small site in the neighborhood of Carchemish, were carried out in 1994 and 1995.¹¹ Evidence for five periods—Late Chalcolithic (Uruk), Early Bronze Age, Late Iron Age, Hellenistic-Roman, and Islamic—has now been recovered from a number of soundings and four operations. Research was concentrated on the EB occupations that exist 16 m above plain level in area IV. Like other parts of Syria, the Tishrin area became densely settled with defended urban centers and their prolific cemeteries in the mid- and late third millennium B.C. Research has focused on the elucidation of secondary state formation in the Middle Euphrates area, which, because of more restricted arable lands as well as a strategic location on trade routes, developed differently from better-known trajectories in the Habur plains and at Ebla.

Prior to the Early Bronze Age, in period I, Jerablus-Tahtani was the site of a community using exclusively Uruk pottery. Sedimentological analysis indicates that riverside areas were severely disturbed by fluvial action, and that initial occupation occurred on the active floodplain. Evidence from areas I, III, and IV suggests that fundamental changes took place during the subsequent Early Bronze Age. Most deposits can be attributed to pre-fortification or fortified phases, but we have only reached the upper levels of the earlier phase, and it is not yet possible to state whether occupation continued uninterrupted from the Late Uruk period.

The pre-fortification sequence of domestic structures culminated in a destruction horizon and silt-ing prior to the construction of a fort on a different alignment. Finds include a jar fragment with a cylinder-seal impression depicting a long-horned quadruped and serpent between a partially preserved rosette and quadruple spiral set on a register composed of triangles. This impression suggests an important glyptic figurative tradition in the Aleppo-Carchemish area ancestral to the better-known Ebla-Hama impressions. Another, later impression was made by a square stamp with a rosette very like an example from Tell Mardikh IIB.

The fort, enclosing an area of about 300 m², was probably built as part of an integrated settlement plan, which included a drainage system. The unified nature of this radical reorganization may be inferred from a large drain, originating in the center of the site, that was incorporated from the beginning into the stone base of the fort wall. Several features of the wall deserve mention in the context of Syrian EB fortification systems: it seems to have been built in curving segments; it incorporates horizontal and upright bricks; the faces of some segments are coated with a thick, white plaster; there is evidence for casemate construction in area I and a bastion in area IV; and it was dramatically altered by the addition of a secondary external bank some 12 m wide. This massive, white-plastered glacis changed the appearance of the site from one surrounded by a freestanding wall to one more like a large urban center with ramparts. Both the construction of the imposing wall and the redesign of the glacis are large-scale operations probably introduced by an external polity, most likely Carchemish, a city that would not have permitted an independent, heavily fortified site in its immediate neighborhood. Together with Tell el-'Abd and Hammam al-Turkman, Jerablus 2 suggests that EB III northern Syria had small fortlike settlements scattered between the better-known heavily defended cities. Stratified pit and cist graves from the fort or a slightly later period contain pottery, figurines, decorated bone, pins, daggers, silver earrings, and beads and pendants made of gold, carnelian, rock crystal, shell, and a vitreous material.

On the southern spur of the site (area II), beyond the presumed line of fortifications, lies monumental tomb 302 with satellite burials in pithoi (fig. 21). The

¹¹ For details of the 1992–1994 seasons, see E. Peltenburg, "Jerablus-Tahtani," in H. Weiss, "Archaeology in Syria," *AJA* 98 (1994) 106–107; and Peltenburg et al., "Jerablus-Tahtani, Syria, 1992–4: Preliminary Report," *Levant* 27 (1995) 1–28. Principal supporters of the investigations include

the British Academy, the British Ambassador in Damascus, the British Institute at Amman for Archaeology and History, the British Museum, and the National Museums of Scotland.



Fig. 21. Jerablus. Internal view of blocked entrance to tomb 302.

tomb is similar to and roughly contemporary with the Til Barsib hypogeum. Its principal chamber is a 6.6×3.5 m corbel-walled room, oriented east-west, with a partially blocked main entrance on the short, west side. It was constructed with massive, transversely laid, undressed limestone blocks in six courses, with larger blocks for the entrance lintels. Encasing the stone components was a two-phase mound, at least $8 \times 10 \times 2$ m in size, which would have been a visible monument before tell formation engulfed it. The interior of the tomb contained 13 child and adult inhumations but was thoroughly ransacked for precious items. What the looters left behind provides a glimpse of the riches that must have accompanied this elite group: gold and rock crystal beads, silver pins and gold foil, ivory pommels as at Tell Bi'a, copper alloy shafthole axes, poker-buffed spears and daggers, and many pots lying shattered in discrete concentrations, including tall, heavy goblets or champagne vessels. The last items suggest funerary rites reminiscent of the drinking feasts depicted on the standard from the Royal Cemetery at Ur. The tomb complex was set off by walls. The western wall, in front of the entrance, borders a passage at least 20 m long that leads to the upper mound by a sloping, stone-paved floor and seven stairs.

Geomorphological and sedimentological studies indicate that the Euphrates River had abnormally high levels in the later third millennium. The evidence is particularly clear around tomb 302, where fluvial gravels were deposited in a series of deep channels cut into the repeatedly refurbished mound.

Flooding occurred at least 2.5 m above the contemporary landscape. This series of inundations undoubtedly disrupted the flow of subsistence supplies from Carchemish and could conceivably have led to the abandonment of Jerablus-Tahtani. It may also support arguments for widespread climatic change and general systems collapse in the Near East and elsewhere in the later third millennium. These issues require further analysis of collected samples and continued onsite investigations.

Knediğ. Ralf B. Wartke, Berliner Vorderasiatische Museum, reports:

In 1993 the Berliner Vorderasiatische Museum began excavations at Tell Knediğ supported by the Deutsche Forschungsgemeinschaft. The site is located south of Hasseke about 300 m from the western bank of the Habur. This area falls within the salvage zone soon to be flooded by the dam under construction at the time of writing but which, according to the Syrian Department of Antiquities, will have been completed by the end of 1996. Ancient settlement covered both the tell, which at its highest point rises 15.5 m above the plain, as well as a lower town. Fieldwork has exposed an area of about 40,000 m².

Three seasons of excavations have clarified the most important questions concerning the chronology of settlement as well as the temporal relationship between the upper and lower towns. Our operations focused on the plateau of the tell and the southwest and northeast portions of the lower town. A stratigraphic section on the eastern slope of the tell allowed the determination of the settlement

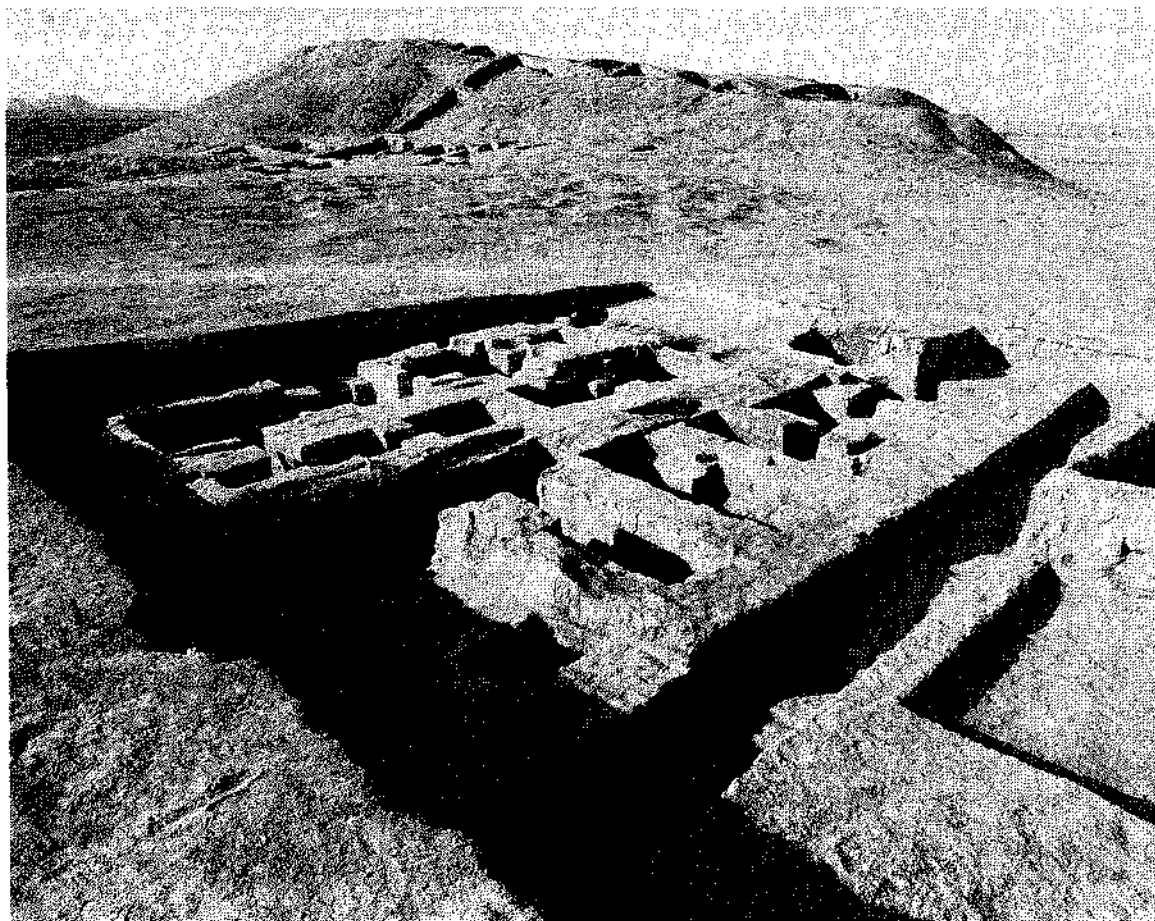


Fig. 22. Knediğ. View of the lower town, with two EB buildings in foreground.

sequence. Strata exposed from the plateau down to the lower town could be grouped into 15 construction levels: level 1 dates to the Islamic period; level 2 has only sparse remains but on ceramic evidence, chiefly Roman Bitumen ware, is dated to the Roman-Parthian period; levels 3-6 belong to the Neo-Assyrian period of the eighth and seventh centuries B.C.; and building levels 7-15, which comprise more than 10 m of stratigraphy, are dated to the Early Bronze Age and represent the most important settlement period of the tell.

On the plateau of the tell, the Islamic construction consists of small residences, which stop abruptly at the wall along the eastern edge of the tell. The remains of the Roman-Parthian level 2 wall lie directly on top of the latest Neo-Assyrian remains. Among these Iron Age levels, only level 6 was broadly exposed, within which two phases could be distinguished. These construction phases are characterized by large structures with rectangular rooms on the order of 3.7×11.2 m in size. Numerous Neo-Assyrian burials were contemporary with these mudbrick

buildings. Single- and double-pot burials were located within the walls, so that findings from the rooms were closely associated with burials. A very similar pattern exists at Tell Boueid, a Syrian excavation under the direction of Antoine Suleiman, where burials were placed within rooms and parallel to the Neo-Assyrian house walls. These burials at Knediğ within an occupied house are distinguished from the graves of level 6a, which were in some cases intrusive into the mudbrick walls of level 6b, and also from an older concentration of graves in level 6b, which were buried in mudbrick rubble and roof collapse. In these cases the buildings had already been abandoned at the time of the burials.

As expected, Bronze Age remains (level 7) were found very close to the surface in the northern part of the plateau. A severe Iron Age disturbance is still without explanation. Excavation revealed a small, 2.25×2.25 m room in which a tannur, traces of plaster in a corner, and additional graves in mudbrick cists were found. An additional rectangular room was uncovered that was filled with mudbrick

debris, numerous ceramic fragments, and the skeletal remains of an individual who died when the building collapsed. The settlement remains from level 7 are dated by ceramics to the Early Dynastic III–Early Akkadian period; the assemblage included diagnostic types such as long-necked flasks and Metallic ware vessels with twin handles.

In the southwestern part of the lower town, extensive EB architectural remains were located at the foot of the tell slope (fig. 22). These had been disturbed in recent decades, however, by round silos dug by the seminomadic inhabitants of the surrounding area. One interesting feature is a 32-m-long mudbrick wall running northeast to southwest, dated to the Neo-Assyrian period but with a foundation set in EB levels. At both ends the wall makes a sharp turn to the northeast, but its function and extent remain unclear. Excavation in the northeastern part of the lower town proved more productive. A noticeable rise at the edge of the settled area seemed a promising spot to investigate. Three Neo-Assyrian construction levels (1'–3') could be distinguished here, but all were severely disturbed by silos as well as by recent Islamic burials. The EB level 4', however, was broadly exposed. Two structures, a well, and a surrounding wall were uncovered in addition to several graves. Both buildings were oriented precisely east–west. Building I, which measured 12.6 × 6.5 m, consisted of eight rooms connected by narrow hallways. The rooms were devoid of artifacts.

Directly to the north, building II was divided into seven rooms, which were modified in later phases. Although the function of the two buildings cannot yet be clarified, use as some kind of storehouse is more likely than a residential function. Directly to the west of building II is a well more than 3 m in diameter, which when excavated contained numerous sherds and animal bones. Preliminary examination suggests that the second, northernmost building is the later of the two; ceramics indicate a terminus ante quem of Leilan IIIc (fig. 23). Although most of the architecture from the northeastern lower town can be dated to the first half of the third century B.C., the ceramics from the EB destruction level of buildings I and II as well as the Early Dynastic IIIB–Akkadian well fill are comparable to the assemblage from level 7 on the plateau.

From all excavations conducted, most of the recovered burials date to the Neo-Assyrian period, although two from the southwestern part of the lower town date to the Roman–Parthian period. Seven graves date to the Early Bronze Age. With only one exception, the Neo-Assyrian graves consisted of single- or double-pot burials and composite burials,



Fig. 23. Knediğ. Early EB painted ceramic funerary vessel, similar to examples from Leilan IIIc.

often covered with mudbricks and large ceramic fragments. One interesting Neo-Assyrian burial made use of an EB pithos. In some cases the double pots contained multiple burials, and evidence also exists for secondary burials. Some interments were rich in grave goods. In addition to the burial vessel itself, the dead were buried with bronze or ceramic dishes, iron knives and arrowheads, and items of personal adornment such as bronze rings, earrings, arm-rings, and ankle bracelets; necklaces made of semiprecious stone, flint, or glass beads; and simple gold earrings and nose-rings.

Of the nonfunerary finds, Islamic-period ceramics were found only on the plateau of the tell, and consisted mainly of plain ware with the occasional comb-stripe decoration or glaze. One particularly interesting fragment from the base of a bowl displayed an underglaze design of a bird with its head bent back and a thorn piercing its throat; this motif calls to mind the story of the nightingale who, for love of the rose, stuck himself with her thorn and so was united with her. The Neo-Assyrian assemblage can be closely compared to those from Assur and Nimrud. Large flasks and pithoi with decorated rims used as burial vessels are frequent. Vessels given as grave goods include wide dishes and small bowls, round flasks, round jars, knob-footed flasks, and steep-walled beakers. Notable in the assemblage are several blue-glazed vessels, both small flasks and open bowls. The spectrum of EB ceramics includes skullcap-shaped bowls, cooking pots with horizontal, triangular, or crescent-shaped grip handles, Metallic ware vessels, notched or incised Ninevite 5 ceramics, and also rare examples of painted sherds. A definite late EB III/IV date can be assigned to long-



Fig. 24. Knedig. Ninth–eighth century B.C. Neo-Assyrian seal impression.

necked flasks in the assemblage. Unique so far is the find of a fragment from a beveled-rim bowl that indicates settlement from the Late Chalcolithic period.

Most of the small finds were recovered from graves. In Islamic contexts scattered finds included a brass cosmetic container, two coins, a stone knob carved in a rosette, and fragments of glass arm-rings. Neo-Assyrian levels yielded stone duck weights and two cylinder seals. The first, made of frit, shows an archer attacking a winged wild sheep, while the second is carved in black stone and depicts a man with a club seizing a winged bull (fig. 24). Small finds from within Bronze Age settlement contexts included a mother-of-pearl pendant in the shape of a reclining cow, terracotta figurines depicting humans and animals, and flint and obsidian artifacts.

Among the previously mentioned Neo-Assyrian grave goods, additional stamp and cylinder seals were found. The worked stamp seals, in the form of scarabs or animals, display on the stamp surfaces Egyptianizing hieroglyphs or symbols such as a scorpion, eight-pointed star, or cross. Two well-carved cylinder seals were also recovered: the first, made of rock crystal, shows a bearded man between two horses, while the other, carved in black glass, depicts two bearded men facing a stylized tree of life. Another cylinder seal shows an archer confronting a dragon. The style of the seals places the graves in the ninth or eighth century, providing information for dating level 6.

Leilan. Harvey Weiss, Yale University, reports:

A new extensive excavation area of some 1,500 m² on the Acropolis Northwest, previously occupied by Leilan village houses, was opened in September–October 1993.¹² The new excavations, comprising

600 m², have documented two periods of occupation, Leilan IIa and IIb, and a series of modern pits. The entire Leilan IIa occupation (2400–2300 B.C.) comprises part of an elaborate ritual quarter on the acropolis first constructed in the Leilan IIId period (2600–2400 B.C.) and extending well beyond the limit of the 1993 exposure. The Leilan IIa excavation unit features a central mudbrick platform, 15 × 10 m, capped by a mudbrick altar with multiple burnt plaster surfaces; portions of large, white-plastered rooms built against the platform's eastern face (fig. 25), including a sealed pit filled with human bones (studied by M. Zeder, Smithsonian Institution); a ramp and a mudbrick staircase built against the platform's southern face; three rooms, one filled with carbonized grain, and another with six large storage vessels and two copper or bronze spearheads on its floor, set against the platform's western face; a "green space," devoid of architecture, between the southern staircase and the western rooms; and a massive mudbrick enclosure wall surrounding the ritual complex and extending from at least the western edge of the acropolis to the northern edge.

The white-plastered walls of the Leilan IIa phase were truncated, and surfaces of mudbrick and thick mud plaster were laid over them and over ashy room deposits. Two constructions were set upon these Leilan IIb prepared surfaces: 1) stone walls, up to 1.2 m wide, constructed of coarsely prepared basalt boulders (some walls had three to five courses of mudbrick [40 × 37 × 8 cm] upon them, and others were simply topped with a surface of mud plaster and large potsherds); and 2) a large mudbrick building with walls three bricks thick. Portions of two rooms of this building were retrieved in the 1993 excavation unit.

Exterior surfaces of these structures covered the period IIa platform, leaving only the burnt altar surfaces at floor level. In addition to the Leilan IIb ceramic dating of these surfaces and constructions, additional dating is provided by a fragment of an Old Akkadian tablet (L93-12, fig. 26), and a fragmentary Old Akkadian sealing (L93-66) inscribed "Hayabum the shabra-official," studied by F. Ismail, Aleppo University, and M. Van De Mieroop, Columbia University.

A 4-m deposit with many crosscutting storage and garbage pits extends down from the floors of the

¹² Research and analyses were funded in 1993 and 1995 by grants from Malcolm Wiener, Leon Levy, Raymond and Beverly Sackler, the National Endowment for the Humanities, and Yale University. Recent research reports include H. Weiss et al., "The Genesis and Collapse of Third Millennium North Mesopotamian Civilization," *Science* 261

(1993) 995–1,004; Weiss et al., "Tell Leilan, 1993," *AAS*, in press; M.-A. Courty and Weiss, "The Scenario of Environmental Degradation in the Tell Leilan Region, NE Syria," in N. Dalfes, G. Kukla, and Weiss eds., *Third Millennium Climate Change and Old World Social Collapse* (Berlin 1997) 107–48.

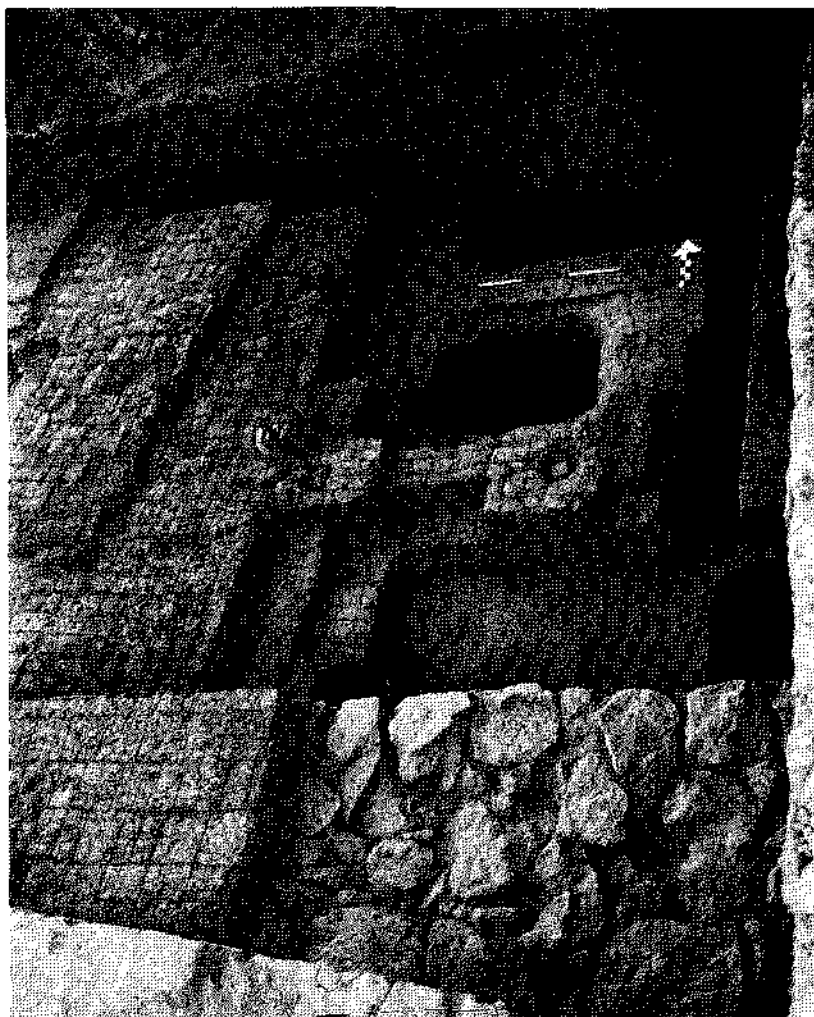


Fig. 25. Leilan. Acropolis Northwest. Period IIa room built against eastern face of cultic platform, with pit sealed by period IIa floor; portion of period IIb brick-topped stone wall in foreground.

Leilan village houses removed from the excavation area. This deposit rests upon the collapse surfaces of the Leilan IIb/Akkadian occupation and the stratum marking a post-Akkadian hiatus. No occupational surfaces were observed within the pit-filled deposit. Some pits extended a few centimeters into the Leilan IIb mudbrick constructions.

The Acropolis Northwest excavations confirm the Leilan occupational sequence defined previously, documenting a very large, walled, ritual quarter first constructed during Leilan IIId (the period of secondary state formation), used through Leilan Ila times (the period of indigenous state consolidation), and renovated in Leilan IIb times (the period of Akkadian imperialization). The integration of Tell Leilan within the Akkadian imperial system imposed upon the Habur plains is now documented chronologically (ceramic relative chronology, radiocarbon

dates, inscriptions, and sealings), administratively (cylinder seals, "sila"-bowls, and the platform and altar in the renovated cultic quarter), and demographically (construction of the city wall and nucleation of regional settlement). Subsequent excavation of this quarter will aim to elucidate its pre-Akkadian, indigenous administrative and religious functions, its period IIId initial constructions, and the period IIb conditions that preceded it and engendered third-millennium urbanization and state formation.

The third survey of the Leilan region ($r = 15$ km) was undertaken in September–October 1995 with the assistance of Elena Rova, Università di Venezia, Ulla Kasten and Debra Euler, Yale University, and Richard MacNeill. The purpose of the survey was to examine the numerous areas and sites left unstudied by the 1987 Leilan region survey. Coverage of the Leilan region is still incomplete, but prelim-

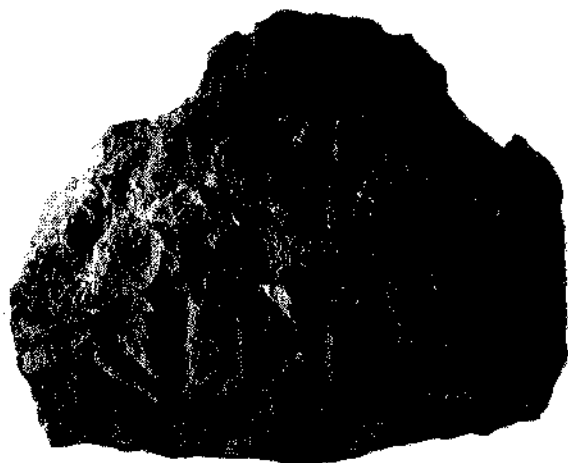


Fig. 26. Leilan. Acropolis Northwest. Fragment of an Old Akkadian tablet.

inary results of the 1995 survey provide the following regional site frequencies: 49 Leilan VII–VI (Halaf/Ubaïd) sites, 8 Leilan V (Late Ubaïd/Early Uruk), 7 Leilan IV (Late Uruk, 3000–2900 B.C.), 5 Leilan IIIa (Early Ninevite 5, 2900–2800), 20 Leilan IIIb–c (Middle Ninevite 5, 2800–2600), 11 Leilan IIIId (Terminal Ninevite 5, 2600–2400), 22 Leilan IIa (Leilan, 2400–2300), 13 Leilan IIb (Akkadian, 2300–2200), and 64 Leilan I (Habar, 1900–1700) sites.

These data alter significantly previous conclusions about Leilan regional settlement. The surprisingly dense occupation of the Leilan region during Halaf/Ubaïd times (approximately eight times that of the Brak region) coincides with a dense frequency of similar occupations observed in a test survey of the Radd swamp around Sultan erTellul, 30 km south of Leilan, at the present-day 200-mm isohyet. These data also confirm other observations for a wetter Halaf/Ubaïd period, dense settlement in northern Mesopotamia, and an early trend toward political centralization at Leilan suggested by recent excavation data for a Leilan Late Ubaïd settlement of ca. 20 ha. The severe reduction in Leilan regional settlement (both number of sites and total area occupied) during the Uruk through Early Ninevite 5 periods remains to be explained.

Leilan IIIId, the period of regional and northern Mesopotamia urbanization and secondary state formation, shows the absorption of earlier Leilan IIIb–c village settlements into Leilan itself and other town sites, while the succeeding period of state consolidation shows an expansion of state control over the agricultural landscape. Topographic mapping, systematic sherd collection, and soil testing were undertaken 14.5 km west of Tell Leilan, at Tell Aid, by

M.-A. Courty (CNRS, Paris) and S. Gaffie (Institut national agronomique, Paris-Grignon). The 60-ha site provided evidence for growth comparable to that seen at Leilan in the Leilan IIIId–IIb periods. The 1995 survey data also confirm the subsequent Akkadian centralization of political and economic control with the displacement of secondary center populations into Leilan and other primary administrative centers. Virtually no evidence for occupation during the post-Akkadian period (2200–1900 B.C.), the period of the “17 kings who lived in tents,” was identified. The 19th-century B.C. repopulation of the region around Leilan/Shubat Enlil entailed dense settlement of 64 villages, providing a new perspective on the history and economic base of Shamshi-Adad's empire. The fluctuation of site size through time and regional distributions are under analysis. The survey will be continued in future seasons.

The Habur plains “routes rayonnantes,” observed from the air by W. van Liere and J. Lauffray, have been much discussed and investigated several times. T.J. Wilkinson suggested that these radiating lines define limited third-millennium cultivation around sites on the Habur plains. Due to modern intensive cultivation the lines are no longer visible on the ground, nor on enhanced LANDSAT images. In order, therefore, to verify them, van Liere and Lauffray's radiating lines were scanned onto LANDSAT images of the Leilan survey region and the sites linked by four systems of 19 radiating lines were then systematically surveyed. In several cases the sites that are linked are modern villages founded in the late 1940s and early 1950s, with no indications of earlier settlement. In most cases, the linked sites are neither contemporaneous nor third-millennium occupations. In each of the four systems' regions there are significant third-millennium sites that are not linked by radiating lines. The radiating lines cannot, therefore, be third-millennium roads, and are probably 20th-century cart and herd tracks. Systematic inter-site surface survey also failed to produce the ceramic distributions typical of ancient manuring residues.

Lastly, Buhairat Shura, a ca. 1-km², perennially flooded depression west of Tell Garassa, was sampled by P. deMenocal, Columbia Lamont Earth Observatory, S. Leroy, Queens University, Belfast, and M.-A. Courty in order to reconstruct mid-late Holocene regional variations in precipitation and vegetation. The depression was sampled at continuous 2-cm intervals over a 7-m trench surface to a depth of 7.3 m for pollen analysis, mineralogy, grain size, magnetic properties, and radiocarbon dating in order to test for variations in sediment lithology and vegetation associated with past fluctuations in the

extent and depth of this depression. The deposit was a succession of unconsolidated clays with variable quantities of coarse silt. Lithologic units were gradational, with some boundaries indicating abrupt changes in water depth and sediment delivery. The samples are now under analysis.

Mardikh/Ebla. Paolo Matthiae, Università di Roma "La Sapienza," reports:

The 30th and 31st excavation campaigns at Tell Mardikh/Ebla took place between August and November of 1993 and 1994.¹³ In 1992, in the Lower Town North, a 4 × 9 m sounding north of the Northern Palace (area P) revealed an important palatial building presumably of MB I date (ca. 2000–1800 B.C.). Therefore, most of the 1993 operations were concentrated in sector P North, with the goal of exposing this building, formerly called building P5 and now defined as the Archaic Palace. At the same time, the exploration of the western wing of Royal Palace G, dating to EB IVA (ca. 2400–2300 B.C.) and located on top of the acropolis, continued on a reduced scale. Area P South excavations were also resumed in EB IVA building P4, which was found beneath the public square of the Sacred Area of Ishtar and between the facades of temple P2 and the huge cult terrace called monument P3. Moreover, soundings were made at the western limits of the MB II Northern Palace in area P West, and excavation of the balks began in the northern region of the same palace. Finally, exploration in the later levels of area G West continued in order to expose a larger region of the level contemporary with Royal Palace G in the western area of the acropolis.

For the large early Syrian town, two major results were achieved, one in the western region of the acropolis, and the other in the Lower Town North. On Acropolis West, the problem of the large pit and east-west terracing wall identified in 1992 was solved in an unexpected way. We discovered a room at the base of the pit, built entirely from fine, squared 5

× 4 m limestone blocks, which we called hypogeum G4. This room, located nearly 5 m below the level of Royal Palace G, must have been a funerary space, now completely pillaged. Built below the floorings of the Archives Palace, it was originally covered with stone slabs that formed a corbeled vault. This discovery is particularly important because it permits the area of the royal tombs of the Archives period to be identified.

In the Lower Town North, the enlargement of 1992 excavations in the western part of building P4 led to the discovery of a new short section of this multifunctional structure at the foot of the central hillock of the acropolis. Building P4, the first building of the Archives period in the Lower Town, probably included workshops for the production of high-quality sculpture, and was associated with an ancient sacred area from the third quarter of the third millennium, on which was later built the large Sacred Area of Ishtar, to which temple P2 and monument P3 belonged.

The excavations in area P North in 1992 and 1993 uncovered a large extension (ca. 550 m²) of the Archaic Palace, the chronology of which had previously been undetermined (fig. 27). An ancient floor on which sherds of Chalciform Painted ware of Hama J5-I and 'Amuq J types were discovered allowed us to ascertain that the Archaic Palace was founded in EB IVB, probably around 2150 B.C., which corresponds to the Post-Palatial period of Ebla (Mardikh IIB2). In this first phase, the Archaic Palace had large rooms up to 4 × 9 m in size, with walls 1.5–2.5 m thick. In the second phase, which dates to the beginning of the MB I period, floors were raised evenly to 0.3 or 0.4 m and smaller rooms were added with a slightly different orientation with respect to the original plan, particularly in the northeast. A third phase of very modest use, which probably dates to the middle or late part of the MB I period, followed a certain amount of soil collapse probably caused

¹³ For previous reports, see P. Matthiae, "Nouvelles fouilles à Ebla en 1987–1989," *CRAI* 1990, 384–431; Matthiae, "L'aire sacrée d'Ishtar à Ebla: Résultats des fouilles de 1990–1992," *CRAI* 1993, 613–62; Matthiae, "Tell Mardikh-Ebla (Siria), campagna di scavi 1993," *Orient-Express* 1994:2, 35–38; and Matthiae, "Tell Mardikh-Ebla (Siria), campagna di scavi 1994," *Orient-Express* 1994:3, 12–16. See also the contributions by Matthiae, "High Old Syrian Royal Statuary from Ebla," in B. Hrouda et al. eds., *Von Uruk nach Tuttul* (Munich 1992) 111–28; Matthiae, "A Stela Fragment of Hadad," in M.J. Mellink et al. eds., *Aspects of Art and Iconography: Anatolia and Its Neighbors* (Ankara 1993) 389–97; Matthiae, "Old Syrian Basalt Furniture from Ebla Palaces and Temples," in P. Calmeyer et al. eds., *Beiträge zur altoriental-*

ische Archäologie und Altertumskunde (Wiesbaden 1994) 167–77; and Matthiae, "The Lions of the Great Goddess of Ebla: A Hypothesis about Some Archaic Old Syrian Cylinders," in H. Gasche et al. eds., *Cinquante-deux réflexions sur le Proche-Orient ancien* (Louvain 1994) 329–38. See also the catalogue by Matthiae, F. Pinnock, and G. Scandone Matthiae eds., *Ebla. Alle origini della civiltà urbana. Trenta anni di scavi in Siria dell'Università di Roma "La Sapienza"* (Milan 1995). For mention of Ebla in the economic texts of the Ur III Dynasty, see D.I. Owen, "Syrians in Sumerian Sources from the Ur III Period," in M.W. Chavalas and J.L. Hayes eds., *New Horizons in the Study of Ancient Syria* (Malibu 1992) 117–21.

by an earthquake; these collapses of the rock layer below surely led to the final abandonment of the Archaic Palace near the end of the MB I period. Later, the MB II Northern Palace was constructed over the ruins of the older building. It is now clear that the peculiar trapezoidal plan of the Northern Palace descends from the similar plan of the Archaic Palace, the east and west perimeter walls of which determined the limits of the later building. While the Northern Palace was in use, the area of the Archaic Palace was employed at first for some installations related to metal production, and later as a waste pit. A large number of late MB I and MB II pottery fragments as well as other objects were discovered there. The most important is an ivory figurine of an offerings bearer, who carries a gazelle against his breast; this MB II masterpiece of ivoryworking probably dates to 1750–1700 B.C.

The original plan of the Archaic Palace of the first phase can be easily reconstructed in the western and central regions of the building, but the modifications of the second and third phases conceal the original structures in the eastern region. The 33-m-long northern limit of the Archaic Palace had in the western region two imposing buttresses, which were probably augmented by a third asymmetrical buttress. In a general evaluation, the palace seems to have been divided into three sectors. The westernmost had two large halls, one 9 × 5 m and the other 10 by at least 5.6 m in size. In the central sector, two smaller rooms occupied the northern periphery while a large and important hall was built in the inner region.

The large hall in the center of the central sector, which thus was exactly in the middle of the building, was 9.5 m long on its east–west axis, but its even greater length on the north–south axis could not be determined because the hall stretches below the Northern Palace. Two important details characterize this room: first, a stone bench almost a meter wide stretched against the whole length of the north, or back, wall and featured a buttress 0.4 m deep in the center; second, the very well preserved gypsum coating on the floor stopped at a regular distance of 0.3 m from the foot of the east and west walls and 1.15 m from the north bench. This second peculiarity leads us to believe that a coating covered the walls, probably wood leaning against vertical mudbricks, remains of which were found partially in place against the west wall. We infer from the bench against the north wall that this hall was the throne room of the building, because a similar peculiarity characterized the throne room of the later Northern Palace.

This newly discovered, important building in the Lower Town North of EB IVB Ebla is probably the royal palace of the period of the Ur III dynasty. After a brief, almost complete abandonment following the destruction of the city by Sargon of Akkad, settlement appears to have been limited to the northern region of the town in the Archives period. The messengers and merchants of Ebla recorded in the economic texts of the Ur III dynasty, between the end of Shulgi's reign and the beginning of Shu-Sin's rule, departed from the town of the Archaic Palace of Mar-dikh IIB.

Mashnaqa. Ingolf Thuesen, University of Copenhagen, reports:

In the spring of 1994 and 1995, a Danish archaeological team conducted its third and fourth seasons of excavation of Ubaid remains at Tell Mashnaqa. This work was coordinated with the substantial excavations of the high mound by a French expedition under the direction of Dominique Beyer, Université de Strasbourg. The 1994 expedition exposed an area directly east of the area excavated in 1990 and 1991, and more than doubled the total area of exposure. Three main strata were identified in previous seasons: stratum I is the first settlement at the site with building remains, stratum II is a meter of thick greenish-gray midden deposit, and stratum III contains the remains of a platform and a large rectangular kiln. All three strata also contained burials.

Our functional interpretation of the stratigraphic and spatial structure of the earliest levels was modified after the new exposures in 1994. Stratum I almost disappeared in the east, and strata II and III showed no architectural features but were pitted by burials, indicating use as a cemetery. In all, 14 burials were discovered, adding to our knowledge of the Ubaid burial tradition. The side-wall burial, which is a pit burial with a short wall along the body on one side, occurs in two variations. In one type, the body is placed in an open pit, which also holds the stretch of wall and a few offerings such as pottery vessels. The body is then covered with soil but the top of the burial wall remains exposed, indicating position and orientation of the burial (fig. 28). In the other type, the body is placed in a subterranean burial cave, and the wall is built in order to cover the entrance after the body and gifts are arranged. Burials without the side wall were also found, with the body placed in an extremely flexed position. Although no traces of rope were observed, the body appeared to have been tied up prior to the interment. A few pots were sometimes found in association with this third type of burial.

The condition of most skeletons did not allow for



Fig. 28. Mashnaqa. Ubaid-period side-wall burial.

safe transfer to a laboratory, so specialists in physical anthropology, odontology, molecular biology, and human genetics were brought to the field in conjunction with the excavation of the burials. Studies include attempts to determine sex, age, nutrition, and diseases among the Ubaid population. In addition to observing *in situ* extraction of ancient DNA from human bones, archaeologists from the Department of Antiquities in Damascus as well as those working in the region had an opportunity to learn the theoretical background for the use of palaeogenetics to characterize human biology and the palaeoenvironment and to see the field methods demonstrated on Ubaid burials at Mashnaqa.

Excavated material included the usual large quantity of potsherds, chipped flint and obsidian, and groundstone adzes and mortars, as well as a smaller number of bone and terracotta items. Computer records demonstrated that, despite doubling the total amount of Ubaid pottery, the relative distribution of main types and the ratio of painted to nonpainted pottery remained constant, implying that the excavated corpus adequately represents the Ubaid material culture at the site. This fact, along with the realization that only a small area of preserved stratum

I architecture still remained unexcavated, led to the decision to sample Ubaid levels at Mashnaqa during a short season in the spring of 1995. Fieldwork was carried out with a small staff. In this closing season, we excavated a 15 × 5 m area to the south of the main area, where we expected to find further remains of stratum I architecture. Part of a house found in 1991 was excavated, and to the south the corner of a new building appeared. This building, unlike the others, had broad mudbrick walls, and within it we found ashy soil rich in artifacts, including two fragments of stone axes or picks and a clay token. Unfortunately, much of this building has been eroded by the river. A simple pit burial was also found. Fieldwork focusing on the Ubaid remains at Mashnaqa has now been completed and the processing and reporting of the results are in progress.

Mishrifeh/Qatna. Michel al-Maqdissi, Directorate General of Antiquities, Damascus, reports:

Mishrifeh, located at the western end of the Syrian steppe, at the crossroads of three interregional routes, was one of the principal ancient centers of western Syria. Together with the study of earlier excavations, a new multidisciplinary research program is designed to enhance our understanding of central Syria and its contacts with the Euphrates valley, the Aleppo plains, and the Syrian coast. In June and July 1994 and in June 1995, excavation and survey were undertaken to prepare a new topographic plan of the site and to determine occupational levels around the acropolis.

The team first concentrated its work within the central part of the site around the upper town (*du Mesnil du Buisson's* "colline centrale") to study the nature of occupation and establish a strategy for the coming seasons. Chantier A, situated at the western side of the upper town northeast of the "Pillar of Lot," revealed a stratigraphic sequence with three levels—Iron II, Late Bronze, and Middle Bronze. Chantier B, near the foot of the southeast section of the upper town, exposed coherent architectural remains ca. 50 cm below the surface. Several walls and stones oriented north-south and east-west were associated with a succession of tamped earth floors (fig. 29), the complex perhaps being industrial in nature. Ceramics are of the Iron II period, with large storage jars, lamps, and small plates. A surface find here, however, was the head of a MB II figurine (fig. 30). MB II tamped earth floors with varied ceramics and a bronze toggle pin were found in a deep sounding in the corner of a small room with mudbrick walls.

Chantier C was opened in the western part of the upper town, a few meters west of the church constructed by *du Mesnil du Buisson* in 1927, in an area



Fig. 29. Mishrifeh. Iron II buildings in chantier B.

that had been cleared of village houses in 1992. Twenty squares in this area exposed, on the east, an important Iron II occupation comprised of a multi-roomed L-shaped house with mudbrick walls set on stone foundations. To the west is another building, with thick walls of mudbrick.

The two campaigns indicate the importance of the Iron II occupation in the upper town and the significant role of the city during the period of Aramaean domination. Intensive collection of surface pottery from the northern part of the upper town, in an area disturbed by relatively recent occupation, provided additional evidence for MB II and Iron II habitation, as well as EB III/IV remains.

Mozan. Giorgio Buccellati, University of California, Los Angeles, and Marilyn Kelly-Buccellati, California State University, report:

The eighth season of excavations at Tell Mozan took place in June and July 1993, and two study seasons were carried out in 1994 and 1995.¹⁴ The excavations were restricted to a limited area: a sequence of three floor deposits in the western portion of sector B of the Royal Storehouse AK, all belonging to stratum B12 (dated to about 2300–2200 B.C.). We decided on this course of action in anticipation of finding a large number of seal impressions in the lowermost of these floors. Given the extreme fragility of these artifacts and the difficulty in identifying

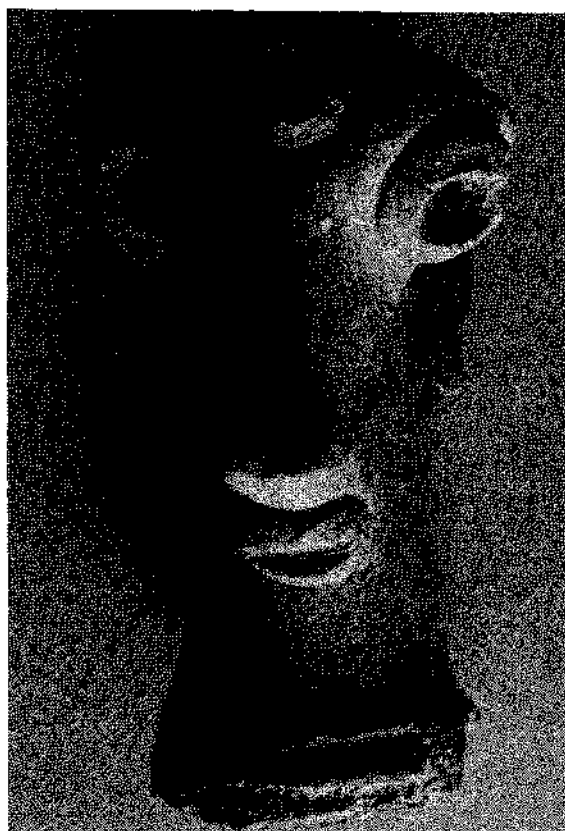


Fig. 30. Mishrifeh. MB II figurine fragment.

¹⁴ Excavations were funded by the National Endowment for the Humanities, Ambassador International Cultural Foundation, Neutrogena Corporation, and various donors.

Study seasons were additionally supported by the Ahmanson Foundation. See reports in *Orient-Express* 1995:3, 67–70 and *AfO*, in press.



Fig. 31. Mozan. Seal impression of Uqnitum, queen of Urkesh, found in Royal Storehouse AK, inv. 8a-2805, ca. 2300 B.C.

them (they are unbaked, very small, and for the most part of the same color as the matrix within which they are preserved), we proceeded with few workmen and very close supervision. Each of the three floor deposits was between 5 and 15 cm thick. We divided the lowermost floor into 1×1 m square loci and sifted the entire accumulation in each. We also took this opportunity to watersieve the entire floor deposit for maximum recovery of botanical remains. Over the three seasons, we were able to complete a descriptive, graphic, and photographic documentation of all the artifacts.

While we knew that the seal impressions were important, we did not expect them to be so rich in information. The most remarkable result obtained from a study of the seals was their identification of the site as ancient Urkesh. But other results, too, were significant. A large number of different seals were evidently used by the same individual, in particular by the king and queen (fig. 31). An unexpectedly close correlation exists between the legends and the scenes, in other words, between the stated profession of the seal owner and the iconography represented on the seal. Finally, we have evidence for an impressive new glyptic style, which is distinct from that of southern Mesopotamia and even from that

of Tell Brak. Our results depended upon the slow and systematic recovery of the corpus of seal impressions and their painstaking interpretation. Out of the more than 600 seal impressions, over 170 of which are inscribed, only six gave us the epigraphic clue we needed for the identification of the site.

The only other major artifacts found in this floor deposit were figurines. More than 100 were found, not counting appendages and other fragments. An exhaustive study has been undertaken by Rick Hauser, to whom we owe the following preliminary description of the main types. Four types of humanoid figurines have been distinguished according to how the artifact is terminated. Six body types have been established based on genus for animal figurines: *Bos*, *Ovis*, *Canis*, *Felis* and other carnivores, *Capra*, and *Equus*. As might be expected, signs of domestication are readily apparent in figurines of dogs and sheep. Curly-tailed dogs are present, with a heavy body type similar to present-day chows or spitz. One dog figurine has not only this heavy body type but also a tail carried high and a four-square stance with fused buttocks, expressed sexual parts, and defined musculature. The body type of the domesticated "fat-tailed" sheep is exemplified by another figurine: full torso, rounded rump, flat and rectangular tail, unexpressed

sexual parts, and little-expressed musculature. Clear signs of domestication are present in the equid figurines, such as depictions of the cheekstrap and browband of a harness. Many examples of *Equus* figurines were found in third-millennium strata; further analysis may lead to differentiation by species within the genus.

The faunal remains were analyzed by Sandor Bökönyi, who was at Mozan for the duration of the 1993 season, and he also worked closely with Hauser to correlate faunal remains with animal figurines. We report here his major findings. The 7,601 identifiable animal bones from Tell Mozan represent a faunal assemblage typical of a settlement. The preservation of the bones, however, is rather poor. The caprovines are the most frequent animal species: of these, 71% were identified as sheep and 29% as goats. The next most frequent domesticated species is the pig, and then cattle, which represented only a seventh of the bones. The remaining three domestic species—horse, ass, and dog—have a much lower frequency in the sample and therefore presumably a much lower importance in the economy of ancient Urkesh. Despite these low frequencies, however, the presence of the domestic horse and donkey in the Mozan/Urkesh assemblage is exciting. Since neither of the two species is related to domesticable wild stock in the area, their introduction to the northwestern part of Southwest Asia implies trade connections as well as new possibilities for warfare and mobility. Twenty-four wild species also occur, among them five ruminants and two ungulates (wild swine and onager). This richness implies not only a large amount of meat but also a potential for increasing the domestic stock from four domesticable wild forms. Overall, however, bones of wild animals accounted for only 2.4% of the total sample, while remains of domesticated animals made up 97.6%, strongly suggesting a dominance of animal husbandry over hunting in the economic life of the site's third-millennium inhabitants.

Qarqur. Rudolph H. Dornemann, American Schools of Oriental Research, reports:

Excavations at Tell Qarqur were resumed with field seasons from July to August in 1993, 1994, and 1995.¹⁵ Tell Qarqur is located 2 km east of the Orontes River at the northern end of the Ghab. Excavations have now reached Iron Age II levels in the

five areas explored so far. Three of these areas have been continued or expanded from areas first investigated in 1983 and 1984.

The greatest effort has been concentrated on the Iron Age gateway in area A on the southern slope of the prominent southern tell. The gate consists of a single 7.5 × 3.8 m room and a 7.5 × 3.2 m entrance porch. A five-step stairway, located in the doorway at the back of the main chamber, leads up to a 3-m-wide stone-paved street that has been traced more than 13 m to the north. The remains of occupation contemporary with the gate are preserved at very different elevations ranging from about 0.3 m just inside the gate to more than 1.5 m to the north, east, and west. The pottery associated with the gateway dates to the ninth and eighth centuries B.C. A tower, preserved in seven courses of roughly shaped blocks of basalt and limestone boulders, begins 80 cm above the Iron Age street. The pottery in the layers associated with and beneath the tower was very mixed, and Ayyubid pottery continues virtually down to the gateway levels throughout the area.

A large scattering of stones to the northeast of the gateway represents collapse from its north wall. Persian-period pottery was associated with a tannur and a rebuilding phase of this wall. Reuse into the Ayyubid period of the rebuilt and associated walls obscures the evidence of Persian and Hellenistic occupation. Removal of the stone fall revealed a doorway through the gateway wall into what was apparently a room to the east of the entryway to the gate. At least four Iron II building phases have been encountered inside the gateway but are preserved only to a height of half a meter.

East of the gate chamber a storeroom filled with broken storage vessels and charred beams is being excavated but the floor contemporary with the gateway has not yet been reached. A small cylinder seal was found near the top of the debris and large quantities of carbonized materials provided an excellent collection of botanical samples. The storage vessels are similar in shape to a nearly complete wine jar found with a collection of iron spear points in the destruction debris against the eastern wall of the main gate chamber.

In our northernmost squares in area A, the Iron Age street was reached beneath 3 m of late fill, mostly deposited by erosion from higher areas of the tell.

¹⁵ Excavations were supported by the American Schools of Oriental Research, the Catholic Biblical Association, and private contributions. For a report on the earlier work

at the site, see J. Lundquist, "Tell Qarqur—The 1983 Season," *AAS* 33 (1983) 273–88.

The street was constructed by leveling heavily burnt and collapsed building remains and then raising the street to the desired height with earth and gravel fill. The heavily burnt bricks of a large building, with walls at least 2 m thick and a partially stone-paved doorway that runs under the street, were being articulated as excavation concluded in 1995. Most of the interior of the associated room in the northeast of the area was removed by later pits. The function and construction history of the building and its relation to the foundations farther south are questions for future seasons.

The fill beneath the Iron Age street contained a very heavy concentration of EB pottery, including a full range of 'Amuq G through J forms with an excellent representation of "Khirbet Kerak" and reserved-slip wares, and phase J painted and incised wares. A good representation of MB II sherds was present, as well as several dark-burnished sherds from the Neolithic period, contemporary with 'Amuq phases A and B. Incidental finds included Ubaid painted sherds, a triangular lug handle and beveled-rim bowls from the end of the fourth millennium B.C., and a small collection of Iron I sherds. One of the most interesting objects was a seal impression on the outside rim of a storage jar dating to the mid-third millennium. The simple design shows a number of quadrupeds in superimposed rows and possibly a human figure facing the quadrupeds. The best parallels for this impression come from Tell Mardikh.

As the large mass of stones exposed earlier beneath the gateway were articulated in 1995, 10 steps from a 3-m-wide stairway were uncovered. The stairway was constructed against a retaining wall that curved east, down and away from the line of the street through the gateway. Again, the trench was intended to explore Bronze Age remains below the gateway, but we had only reached Iron Age levels by the end of the season, and further down the slope excavation was suspended in Islamic levels. A trench dug for an irrigation pipeline 100 m south of the southern tell encountered considerable Islamic building remains. It also documented Hellenistic, Persian, Iron II, Iron I, MB II, EB, Uruk, Ubaid, and Neolithic occupation in the area. These remains support the assertion that occupation at Qarqur extended south about 130 m beyond the edge of the high tell, as is indicated by the contours of the area.

Excavations were also taken up where the 1984 excavations left off in area B on the eastern edge of the high southern tell. Sections of mudbrick walls and foundations in many phases were badly cut by pits, particularly in the northern and southern por-

tions of the area. In the center, particularly in square B2, the excavation continued systematically through the complex stratigraphy encountered in previous operations and then continued down to earlier levels. At least seven Iron II construction phases were evident. The earliest pottery encountered does not seem to date before the second half of the 10th century B.C. and most of the pottery dates to the ninth and eighth centuries. This assemblage includes typical carinated bowls with a variety of surface treatments and large quantities of red-burnished platter bowls, with reds that varied from browns and red-browns early in the period to the strong reds of the eighth century. Materials characteristic of the seventh and sixth centuries B.C. are scarce, and come primarily from pits and surface contexts.

Area E, a trench on the northern slope of the southern tell, was opened in 1995. Though no stone walls were encountered, stones of various sizes scattered across the area apparently represented tumble from walls higher up the slope. A small exposure beneath the scatter of stones revealed mudbrick collapse, burnt debris, and in situ brickwork at the tops of preserved and plastered walls. These remains were associated with pottery that was primarily Early Bronze IV in date, but included a few sherds of Iron Age II as well.

On the large, low northern tell, excavations resumed in 1993 in three new squares adjacent to the area D excavations of 1983–1984. Though Ayyubid, Late Byzantine, and Roman coins were found in the area, the late occupation was poorly preserved. Foundations of a Byzantine building and many ovens were encountered. Part of the area was disturbed by pitting, but good Iron Age stratigraphy was encountered along with the remains of stone and mudbrick walls of domestic buildings.

The pottery associated with these levels is contemporary with the pottery from the gateway area and from the excavations in area B. A good number of heavy storage vessels were found here but also well-made vessels with painted decoration, the usual red-burnished wares, and imported Cypriot wares. The sample is too small to give a reliable indication of the function of the area at this point. If this area is indicative of occupation on the low tell, the Iron Age is much better represented than surface collections and previous excavations led us to expect.

We are just reaching the levels at which the context of materials is secure enough stratigraphically that soil samples and bones will provide reliable materials for botanical and zoological analysis. Initial examination of selected samples from Iron II loci by palaeozoologist Susan Arter indicates that, despite

a heavy reliance on caprids, beef, and pork represent nearly half of all the meat taken from domestic animals. The inhabitants of Qarqur were also exploiting wild resources including deer, bear, wild boar, turtles, birds, fish, and crabs. If the patterns of meat procurement and consumption now evident persist after the analysis of a much larger sample, they may reflect the food preferences of an administrative or diplomatic elite, or an urban population with access to a wider variety of resources than is usually available to city dwellers, perhaps due in this case to the site's unique environmental setting.

Ras Shamra-Ugarit. Marguerite Yon, Mission française de Ras Shamra-Ugarit, Maison de l'Orient, Lyons, reports:

The 1994 excavations, directed by M. Yon and Y. Calvet, were focused upon four areas (fig. 32).

"Centre de la ville." Two projects were undertaken: 1) soundings in house C to verify conclusions about the date of its construction, and to determine the eastern limits of street 1312; and 2) completion of the excavation of house D. Two soundings confirmed the construction of house C in the last phase of the history of Ugarit, and established that the area between house B and house D was an open space. In the mid-13th century the circulation route from street 1038 to the north ended in an impasse, and to the south a narrow passage left street 35 and also terminated in an impasse. Then during the final phase (perhaps at the beginning of the 12th century), the cross-walls and the large wall 1301/1309 were destroyed and removed; one had then a small free passageway. But the constructions are poorly preserved.

House of Urtenu. Excavation in 1986, 1988, and 1992 in the south-central zone, which in 1973 had produced an important series of texts, together with subsequent stratigraphic study, defined the epigraphic archive and its context, the House of Urtenu (fig. 33), named for its last owner, who lived at the beginning of the 12th century. Rectangular slabs found in 1992 seemed to be the cover of a tomb; hence, the 1994 campaign had as its objective the definition of the archaeological context of the tomb and its excavation.

Extension of the excavation to the west allowed the investigation of new rooms. The house was abandoned at the beginning of the 12th century. But some additions postdated the abandonment and could indicate a partial reoccupation. Material retrieved here was of exceptional quality: alabaster vases, Mycenaean vessels, and utensils of stone and bronze. Fifty more tablets were also retrieved, apparently part of the same archive of texts found earlier.

On the eastern side, we traced room 2072 in which the tomb was constructed. Room 2072 has two openings to the north, one to the slab court to the west, and one to the east leading to a small room (1235) less than 9 m². Room 1235 contained 360 complete and fragmentary tablets. Some were found in niches in the southwest wall (one niche contained 40 tablets), while others appeared to have fallen from above.

Excavation of the tomb and the room above it led to further excavation of the house and an attempt to place it in its architectural context. The tomb belongs to the category of large vaulted tombs of dressed stone of the 13th century. The floor was covered with large square slabs; funerary material of the last phase of inhumation included local, Mycenaean, and Cypriot ceramics, and alabaster and faience objects.

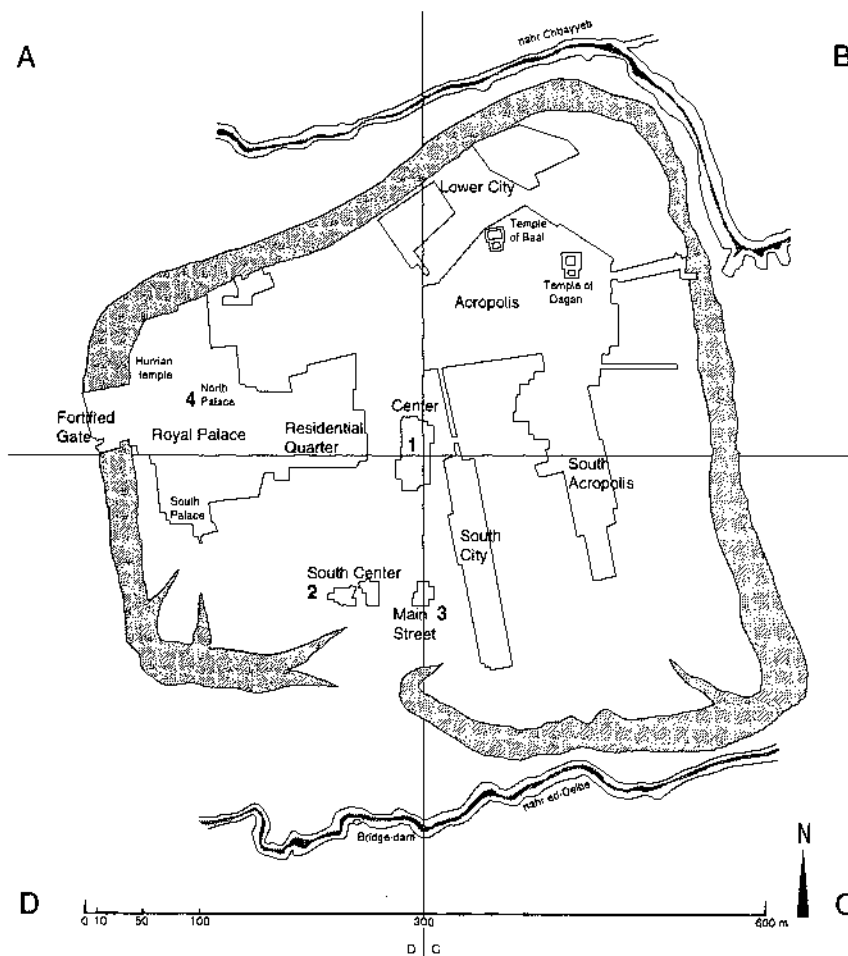
The archive discovered to date in the House of Urtenu, about 600 tablets, comprises the largest archive retrieved at Ras Shamra outside of the Royal Palace. Of the 1994 texts, 80% are in Akkadian, and others are in Ugaritic. Urtenu was apparently a considerable court personage in the last days of the kingdom. The historical significance of the archive promises to be exceptional.

"Grand Rue." A new program of excavation in 1992 in the southern sector defined the continuation of circulation route 3016, which went from the entrance of the city to the center, following the riverside constructions and the large building B situated at the northeast angle of the crossroads. Six weeks of excavation opened a 150-m² area. Excavation of building B, begun in 1994, is still in progress, but it is already clear that its rooms are filled with storage jars and masses of burnt materials, suggesting a violent fire.

North Palace. Five levels of construction have been identified in the street leading to the North Palace, dating from Middle Bronze IIB-C to Late Bronze I. The building situated under the North Palace is contemporary with the House of the Ovens and was perhaps constructed in Late Bronze I. The construction of the North Palace has cut through this level. The 1994 sounding therefore does not support a MB date for the North Palace, which was constructed in a sector already built up. The MB level was not destroyed by the construction of the North Palace, but by earlier LB I activity.

Sheikh Hamad/Dur-katlimmu. Hartmut Kühne, Freie Universität, Berlin, reports:

During the 13th-16th seasons, work at Tell Sheikh Hamad was concentrated in the central part of the lower town. The original goal was to complete the 1984-1987 excavation of the Neo-Assyrian resi-



RAS SHAMRA - UGARIT : Excavated areas 1994

Fig. 32. Ras Shamra. Schematic plan of the site in 1994 and location of excavated areas.

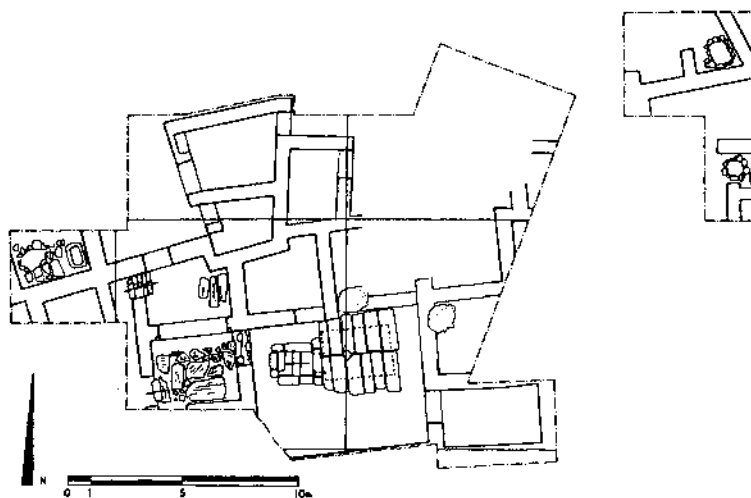


Fig. 33. Ras Shamra. Schematic plan of the House of Urtenu, 1994.

dences of a type well known from the capital, Assur.¹⁶ At the end of 1992, a new building was discovered east of the residence sector with its foundations virtually cut into the former Assyrian residences. A fire that had destroyed parts of the residences apparently precipitated the founding of the new building, named the Red House because the walls of its rooms were covered with a red wash (fig. 34). While larger parts of the residences were restored and reused, a destroyed room next to the new foundation was simply covered with a new floor, thus sealing the contents underneath. This room was filled with inventory, thus marking the material culture at the time of destruction.

In the room at the northwest corner of the new building (fig. 35), built directly into the walls of the sealed inventory room, four unique cuneiform tablets were discovered. They were written by an Assyrian scribe, in the Assyrian language and according to an Assyrian formula, but they were dated to the years 2 and 5 of the Babylonian king Nebuchadnezzar II. This seems to indicate that the foundation of the Red House took place in the post-Assyrian period, implying that the destruction prompting the new foundation was to be viewed in combination with the downfall of the Neo-Assyrian Empire. These tablets prove for the first time that the Assyrians and the Assyrian way of life continued after the breakdown of the empire and that the Assyrians did not disappear completely, as so many handbooks lead us to believe.

These results motivated a decision to excavate the Red House extensively, if not completely, in the course of the following seasons. By the end of the 1995 season, the ground plan of the whole building was exposed. The building covers an area of 4,200 m², and was built with mudbrick walls averaging 1.4 m in thickness. The courtyards are paved with bricks. Two wells furnished fresh water and a sophisticated drainage system served all parts of the building. Three staircases once led to an upper story.

The building apparently consists of a residential part in the west and an official part in the east. The entrance to the residential part is situated in the south, consisting of a 14-m-long corridor leading toward a large central courtyard. From this courtyard, separate units are accessible, each composed of a large hall, a smaller hall, a bathroom, a kitchen, and one or more storerooms. The southwestern unit is

grouped around a separate courtyard; the central of three boxlike rooms on its eastern edge contained one of the wells.

The official part of the Red House was accessible from the north through an entrance hall and staircase. The central courtyard also allowed access to the official part of the building via another staircase room in the northeastern corner. Two separate courtyards had to be traversed toward the south to reach a hall 16 m long that formed the main room of the official part. This hall gave access to a number of rooms in the south and in the southeast. To the east, the hall was connected with a small room and a corridor, which led to a series of rooms in the east as well as the southeastern corner room of the building. In this small room as well as in the corridor some 30 heart-shaped dockets were found in association with hundreds of jar sealings and fragmentary jars, all of which had apparently fallen from the upper story on the occasion of a severe conflagration that destroyed the entire building. Some 200 jar sealings are stamp-sealed with about 20 different seals.

The dockets deal with economic affairs; they are written in Aramaic and some are dated with Assyrian eponyms. All of the recorded eponyms belong to the so-called "post-Canonic" period. This evidence again raises the question of which Assyrian kings should be associated with these eponyms. In any case, they stem from the final years of the Assyrian Empire and were found in a context that, based on the typology of the building and on the evidence of the above-mentioned tablets, is un-Assyrian as well as post-Assyrian, a period rarely covered by material evidence.

After the destruction of the building, some parts of it were reoccupied. In one room excavated in 1994, two ostraca were found that were dated on epigraphical grounds to the fifth century B.C., in other words, the time of the Achaemenid Empire just after the Late Babylonian period. This reoccupation seems to close the history of lower town II in Dur-katlimmu, except for a Parthian-Roman cemetery that covered most of the area of the former Red House from the second century B.C. to the third century A.D.

Shiukh Fawqani. Luc Bachelot, CNRS, Paris, and Mario Fales, Università degli Studi di Verona, report:

On the basis of the results obtained during the first campaign at Shiukh Fawqani (October 1994), the Expedition¹⁷ decided to continue the excavation

¹⁶ For a report of previous excavations, see H. Kühne, "Tell Sheikh Hamad/Dur-katlimmu 1985-1987," *Afo* 36-37 (1989-1990) 316-23.

¹⁷ Groupe international de recherches archéologiques

(GIRA) is formed of French, Italian, and Syrian archaeologists, historians, and palaeoenvironmental specialists, coordinated by Bachelot and Fales, and including Marta Lucioani, Martin Makinson, and Daniele Morandi.

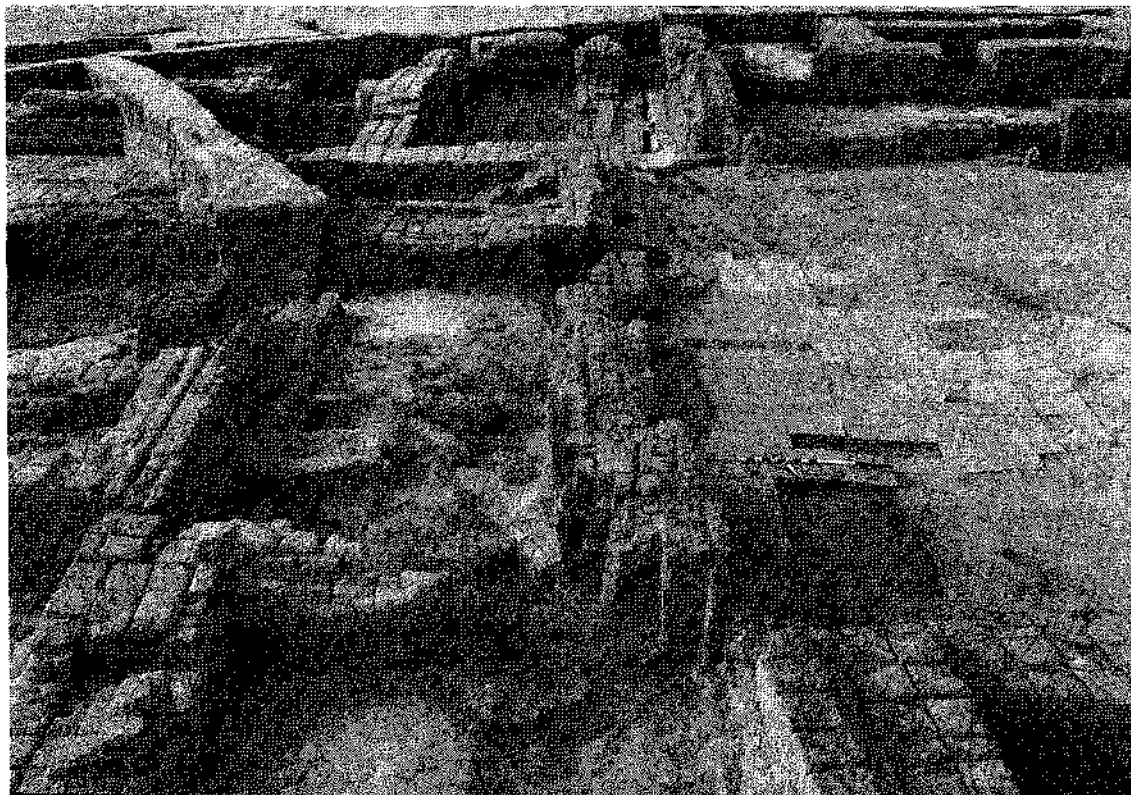


Fig. 34. Sheikh Hamad. Central courtyard and entrance corridor of the Red House, end of the seventh century B.C.



Fig. 35. Sheikh Hamad. Red House, archive room and corridor from the east.

in three of the five sectors that had been previously investigated: sectors D, E, and F.

Sector D. Phase A, the most recent of the three phases identified, is represented by a group of structures in mudbrick, lying on foundations constructed of large stones from the Euphrates riverbed. Erosion has almost entirely destroyed the superstructures. A preliminary analysis of the pottery of this phase suggests a date corresponding to EB III or IV. The buildings of phase A occupy almost all the area of the two squares opened at present, and probably continued beyond these limits in all directions.

Phase B is characterized by what are by far the most impressive and best-preserved buildings discovered on the site this year, reaching to a height of approximately 3 m. Two rooms were entirely excavated, while two more were traced on the surface. A preliminary examination of the pottery dates this architectural complex to EB I and II (first half of the third millennium). The jars are characteristic of this period, with everted rims and decorated neck and shoulder. Also noteworthy is the lithic material, mainly "Canaanite blades" as well as blades of triangular section, some of considerable size (165 × 40 × 10 mm). The original floors of rooms 1 and 2 and the limiting walls had been installed on the remains of previous buildings, which were taken down, leveled, and used as foundations of the new buildings. These remains form the main elements of the phase C occupation.

Sector E. Sector E was opened to continue recovery of the portion of the settlement of the Late Bronze Age that had yielded an exceptional pottery assemblage (more than 30 complete forms), despite the limitations of the sounding in 1994. The corner of a room that we had not managed to clear in 1994 was cleared during the second campaign. To the already rich pottery assemblage some 10 complete forms have now been added, some of which seem to represent previously unknown types.

To extend the exploration of the destruction level here, an area of more than 50 m² was opened around the 1994 sounding. The top of the destruction level, corresponding to that of the room excavated in the previous campaign, was only reached at a depth of 3.80 m. A second room, measuring 5.30 × 6.50 m, was excavated to the east of the first one. Its characteristics are exactly the same: a floor extremely rich in material, sealed by a destruction layer formed by walls and fallen roofing.

Sector F. Epigraphic discoveries of considerable importance were made beneath a group of Islamic tombs and eroded Roman levels represented by remains of terracing and some fragmentary floors and walls. In a building and on the floor of a room, located approximately 2 m beneath the present-day summit of the tell, a small archive was found: it included two complete tablets and various fragments inscribed in Aramaic alphabetic script, as well as Assyrian texts. The largest of the Aramaic tablets bears a legal text relating to a loan of silver. Three stamp-seal impressions are placed on the upper margin of the tablet; two of them would seem to represent signs of the Neo-Hittite hieroglyphic repertoire. The second tablet from Tell Shiukh Fawqani appears to represent the longest document discovered so far within the small corpus of Aramaic texts on clay tablets of Neo-Assyrian date. It is also a legal text. Both the Assyrian and the Aramaic texts are part of one family archive, and demonstrate a general fluency in both languages and forms of writing during the seventh century B.C. The small area cleared this year, in relation to these interesting finds, suggests that future campaigns will allow us to learn more about everyday life and the history of the population in this remote province of the Assyrian Empire.

Sector G. After villagers made a chance discovery of a bronze cup at the base of the eastern slope of the tell, a small sounding (2 × 3 m) was excavated for 10 days. The first level consists of a tomb with a complete jar. Just above its opening, we found a small overturned bronze bowl. It would seem that the burial pit was covered by mudbrick. In the second level, two further tombs were uncovered. One of them had held the bronze cup found by the villagers. This burial pit was covered by mudbrick. The third level was only partially reached during the last days of the campaign, and only a pisé wall 0.55 m thick was located. The concentration of these three burials within an area not exceeding a few square meters suggests a complete necropolis in this sector. Its excavation will be continued in the following season.

Sweyhat. Richard L. Zettler and Michael D. Danti, University of Pennsylvania, and Peter N. Peregrine, Lawrence University, report:

The seventh and eighth seasons at Tell es-Sweyhat were conducted in the springs of 1993 and 1995.¹⁸ Excavations on the west side of the main mound have now provided a sequence of eight major occupation

¹⁸ Excavations were sponsored by the University of Pennsylvania Museum of Archaeology and Anthropology and supported by the National Endowment for the Hu-

manities and the National Geographic Society. For a report on previous excavations, see Weiss (*supra* n. 11) 139–42.

phases spanning the third and early second millennia B.C. Phase 4, which dates to the time of the settlement's florescence in the late third millennium, includes the structure known as the "kitchen building," described in our report on the 1991 excavations. In preparation for the construction of the kitchen building and contemporary structures, the western side of the existing mound was cut down ca. 0.95 m and a level surface was created. A stone retaining wall was then built against the cut face and raised to a level above the surface into which the cut was made. The area behind the retaining wall was filled in, probably with soil dug out of the western side of the mound.

The kitchen building stood across an alleyway or street from the area IV building and abutted the stone retaining wall. Remains uncovered to date include two rooms on each side of an L-shaped courtyard. The kitchen building was rebuilt once in the course of its existence. In addition to the kitchen building, phase 4 included three rooms associated with two buildings to the north.

These phase 4 buildings existed on a lower level than whatever stood to the east. The surface of the fill behind the retaining wall revealed no trace of buildings, and may have been open space. That open space would have separated the kitchen building and the area IV industrial/storage facility on the west side of the main mound from structures at the center of the settlement.

Earlier excavations suggested that the lower town represented an ideal field situation for mapping by remote sensing. In 1993, a pilot program was undertaken to determine the feasibility of geomagnetic mapping. It employed a Geoscan FM-18 gradiometer provided by the University of Bradford's Department of Archaeological Sciences and collected data using a system of 400 data-point grids, with magnetic readings taken either at 1-m intervals over a 20 × 20 m grid or at 0.5-m intervals over a 10 × 10 m grid. A total of 93 grids (86 large and 7 small) were collected in seven separate areas (blocks 1–7) of the outer town.

Our fieldwork in 1993, designed to test the reliability of the instrument and collection methods, as well as the validity of the data for generating maps of archaeological features, proved the technique feasible. In 16 days, 4 ha of the lower town were mapped, and useful and informative archaeological maps subsequently created. Block 1, for example, has provided a map showing the outer and inner fortification walls, a gateway in each wall, room blocks, a network of streets, and an industrial area of kilns.

In 1995, the geomagnetic survey continued with two distinct aims: to collect additional data over large

contiguous blocks of the lower town and to use the remains we found on the ground to aid in interpreting the magnetic data. We collected data over two areas: block 8, consisting of 80 20 × 20 m grids on the site's western side, and block 9, 32 20 × 20 m grids on the site's southern side. Analysis of the field data is currently in progress.

Our pilot program in 1993 tested the validity of geomagnetic mapping by excavating an area (operation 16) previously mapped at 1-m and 0.5-m intervals (fig. 36). Operation 16 yielded evidence of several building episodes, the best preserved of which included parts of six loci that may have been exterior spaces. The most prominent features were horseshoe-shaped kilns. These yielded substantial numbers of wasters and fused sherds, suggesting that the kilns were used for firing pottery. Both the kilns and the lines of the walls showed up clearly in the geomagnetic maps of the area.

In 1995, excavations were undertaken in two additional areas mapped in 1993. Operation 23 was a 10 × 10 m square laid out over a marked geomagnetic high, roughly circular in shape and about 5 m in diameter, and yielded a large circular kiln, ca. 5 m in diameter, sitting in a shallow depression in virgin soil. Operation 25, a 2 × 30 m trench across the eastern outer fortification wall, produced a sequence of three major occupational phases. The second phase consisted of the outer fortification, built on the leveled-off remains of the earlier buildings tentatively dated to the third quarter of the third millennium. The eastern wall, dated to the late third millennium, was apparently an earthen rampart faced on the outside with a sloping stone revetment and on the inside with a mudbrick wall 20 m wide and set on stone footings. The outer fortification wall identified on the geomagnetic map of the area consisted of parallel linear low magnetic anomalies about 20 m wide. These excavations demonstrated that Tell es-Sweyhat was already a substantial settlement covering the main mound and the eastern lower town in the third quarter of the third millennium, and its circumvallation was contemporary with the settlement's expansion in the late third millennium.

Planned excavations were interrupted in 1993 when the landowner began irrigating the northwestern lower town. The flow of water opened up several deep holes, revealing the location of shaft-and-chamber tombs. Salvage excavations were undertaken on two open tombs, 001 and 002. The rectangular shaft of tomb 001, cut from the level of sterile soil, was about 2 m deep. It ended on a narrow ledge, from which two steps led down to the floor of a chamber about 5 m in diameter. The 2.5-m-high chamber was

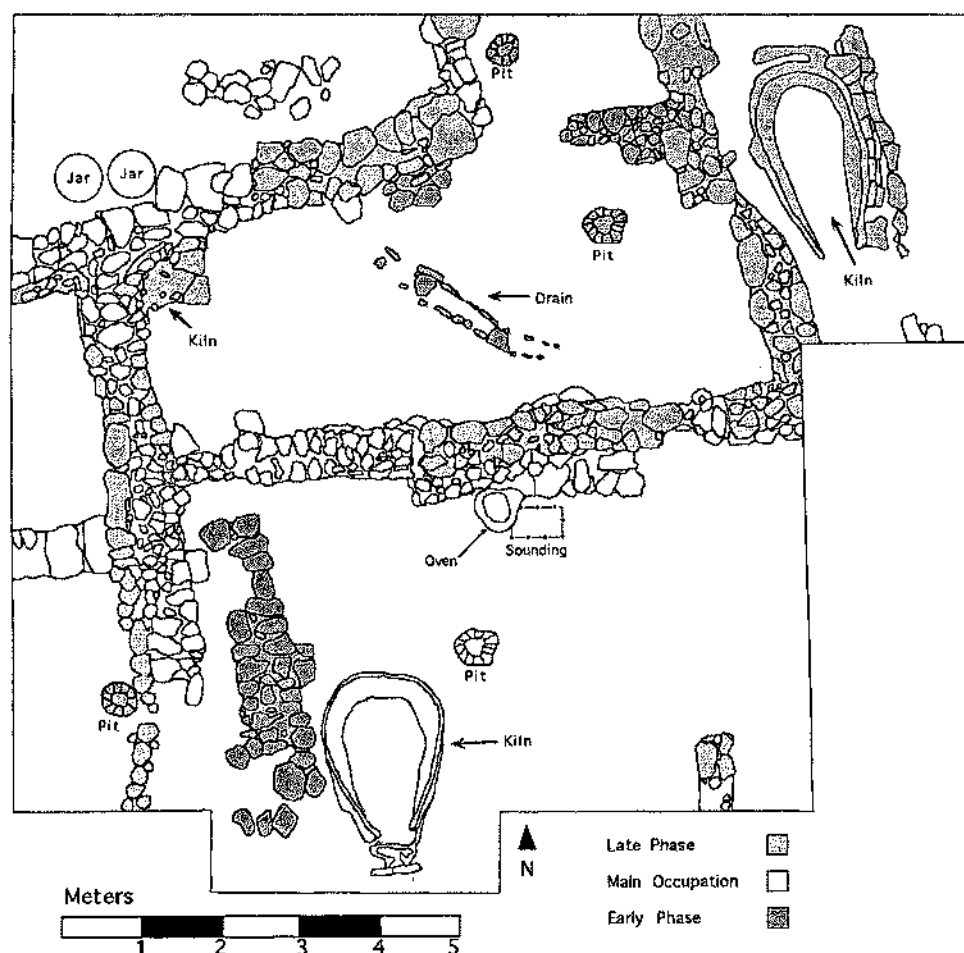


Fig. 36. Swayhat. Plan of operation 16.

dome-shaped. Both tombs had been looted, but pottery, small finds, and bones confirmed their function and suggested a date in the third quarter of the third millennium.

A sinkhole in 1995 revealed the location of an unlooted tomb, and a 3×3 m unit was laid out and excavated. The tomb chamber was oval, measuring 3.9×4.9 m. The floor contained two articulated skeletons, both on the western side of the chamber. The smaller and more poorly preserved skeleton was associated with two crossed straight pins made of copper or bronze, limestone rings, and a series of beads at the breast, including two small zoomorphic beads in the shape of a cow or bull. The arrangement of pins and beads is similar to that worn by females shown on shell reliefs from Mari. Near the skeleton's head were two model wheels, perhaps originally associated with a model wagon recovered from a large pile of pottery against the north wall of the tomb chamber. The remainder of the human bones from the tomb were scattered around the chamber's floor.

The tomb contained at least 10 individuals, and also yielded animal bones. The Tell es-Sweyhat tombs are spread over an area of at least 1 ha on the north-eastern periphery of the mid-third millennium village, and the cemetery may include in all 100–150 tombs.

Finally, in 1993 a new phase of regional work was initiated to investigate the evolution of the third-millennium settlement system surrounding Tell es-Sweyhat. Excavations have so far focused on Wilkinson's site 3, informally dubbed Hajji Ibrahim, which is 0.25 ha in size and rises 2.6 m above the plain. This site, located 500 m southeast of the outer fortification wall, is one of seven small early third-millennium sites on wadis within 4 km of the Tell es-Sweyhat. Aerial photographs show Hajji Ibrahim to have a distinct rectilinear form. Excavations have revealed two major phases of occupation dating to the first half of the third millennium. These phases produced at least four structures consisting of a single, central compound fronting on a courtyard sur-

rounded by one-roomed rectangular structures. One of these mudbrick structures measured 4.6×3.8 m, and material remains from associated contexts suggest that it may have been a silo. Hajji Ibrahim was abandoned at the time of Tell es-Sweyhat's expansion in the late third millennium.

Tuneinir. Michael Fuller and Neathery Fuller, St. Louis Community College, report:

The 1993, 1994, and 1995 campaigns at Tell Tuneinir involved excavations in four sections of the site.¹⁹ Research objectives included the definition of Islamic-period commercial structures, identification of features related to a church once used by a Syriac-speaking congregation, and the secure dating of various pre-Islamic strata.

Area I. Horace Hummel, Concordia Seminary, supervised the excavation of third-millennium loci in squares 61 and 62. A charcoal sample (Beta 59953) from these levels produced a radiocarbon date of 2460–2030 B.C. (this and all other ¹⁴C dates given are calibrated values). The third-millennium loci are predominantly ash-rich strata that contain moderate quantities of medium to coarse plainware, Metallic ware, and Ninevite 5 sherds; clay figurine fragments representing sheep, goats, horses, and wagons; and flint sickle blades and bone tools. A clay token from this area corresponds to an astragalus-shaped type in Schmandt-Besserat's study of tokens, but is twice the size of similarly shaped tokens from Chaghar Bazar and Nuzi. One of the few features discovered in these loci is a secondary burial of three fragmentary human skulls in a pit lined with mudbrick and capped by basalt cobbles. A fault, possibly evidence of ancient earthquake activity, was also identified in these squares. The fault, which extends into the bedrock below, displaced beds an average of 30 cm and created several small cavities within the fill of the mound.

Animal bones from third-millennium deposits, analyzed by Michelle Loyet of Washington University, consist almost entirely of domesticated animal bones (sheep, goats, equids, and cattle) and a handful of gazelle bones. Sheep and goats were by far the most intensely utilized animals during the third millennium. No remains of domesticated pigs have been identified in the bone samples from area I.

Excavations near the summit of the tell in area I have uncovered several Islamic, Byzantine, Roman,

and Iron Age loci. A pre-Islamic destruction layer was discovered during the first excavation season in 1987. Additional walls and floor surfaces associated with this episode were investigated during 1995. Fragments of a blue-glazed Parthian-style jug were found in the destruction fill, as well as sherds from the shoulders of unglazed jars decorated with the distinctive Parthian motif of an incised zigzag pattern. Sherds from several large, tar-lined storage jars bear inscriptions written in tar with broad strokes; one of these consists of three letters written in the Parthian script typical of the second and third centuries A.D. Mudbrick walls belonging to Late Roman houses were also uncovered during 1995. Associated artifacts include two fourth- or fifth-century lamps similar to examples from Dura Europos, and copper coins that confirm this dating.

Church in area III. Excavation of a low mound along the eastern edge of Tuneinir, supervised by David Hanlon, St. Louis Community College, established that a church existed at Tuneinir and was constructed in four distinct architectural phases. In current seasons, our attention turned to the structure's periphery. A cistern was discovered in 1994 outside the northwest corner of the church. A number of artifacts were found intentionally discarded in the cistern beneath 1 m of earth and rock fill. The most significant of these artifacts are two amber-colored glass oil lamps and a clear glass wine chalice (fig. 37). A radiocarbon sample (Beta 74631) taken from beneath the glass artifacts provided a date of 380–700 A.D., while a sample from deeper in the cistern fill (Beta 74632) was dated to 660–970 A.D. Byzantine, Umayyad, and Abbasid artifacts such as lamps, pottery, and coins were found in several loci within the cistern. Outside the cistern but also to the northwest of the church, a glass ampulla was found in 1995. The ampulla resembles a type of glass flask produced in the third century A.D. Ethnographic evidence suggests that the ampulla served as a container for chrism, a sacred oil used in anointing and in ceremonies of consecration.

Market in area VI and khan in area VII. Sharon Doerre, University of Texas at Austin, supervised excavation of Tuneinir's market. The 50-room ruin is adjacent to the ruins of two khans and a bath. The rectangular shops face the streets along the east and north sides of the market. The remains suggest that

¹⁹ For previous reports on the site, see M. Fuller and N. Fuller, "Tell Tuneinir on the Khabur: Preliminary Report on Three Seasons," *AAS* 37–38 (1988/1989) 279–90; "Tell Tuneinir 1986 and 1987," *AJO* 36–37 (1989/1990) 332–35. Reports concerning the church include Fuller and Fuller,

"A Medieval Church in Mesopotamia," *BA* 57 (1994) 38–45; "Vessels from an Early Christian Church," *BA* 57 (1994) 245; and "Continuity and Change in the Syriac Population at Tell Tuneinir, Syria," *Aram* 5 (forthcoming).



Fig. 37. Tuncinir. Glass wine chalice (center) and glass oil lamps from church in area III.

meat and baked goods were sold from shops on the north side, while shops along the east side sold jewelry and fine pottery. The eroded plaster bases for swifts, used in spinning and weaving, were recovered in the upper fill of several shops, suggesting that textile production occurred on the second floor above nontextile shops, a pattern seen today in modern Aleppo. The southwest corner of the market served as a pottery yard and included a kiln, settling tank, and well. Several hundred coins were recovered from the market during three seasons of excavation; the majority are Ayyubid, Zangid, and Urtukid dirhems and fils dating to the late 12th and 13th centuries. Copper coins minted at Sinjar, 90 km to the east, are the most prevalent issue, but coins from the mints of Mayafarakin, 200 km north, and Aleppo, 320 km west, are also frequent.

A 2 × 4 m probe trench was excavated beneath the 13th-century street surface in square 89 to test for earlier structures. A meter of mixed fill separated the Ayyubid market from an Abbasid cesspit filled with broken pottery, animal bones, and organic waste. Sterile soil was reached 4 m below street level in the deep probe. Bone collagen from the deepest levels in the probe provided a radiocarbon date of 420–670 A.D. (Beta 74633).

Patrick Berger, St. Louis Community College, supervised the excavation of the north khan, the entrance of which aligns with the north entrance of the market in area VI. The dimensions of the north khan, 23.7 × 23.5 m, are almost identical to those of the original south khan before the latter structure was modified by the addition of a mosque, corral, and shops. The walls of the north khan are 55–85

cm thick and were constructed with a core of mud-bricks faced with stone and mortar. This is an economizing construction when compared with the solid stone and mortar walls used in the south khan, bath, and market. Animal bones from the north khan consist primarily of goat and sheep femur and humerus fragments. Copper coins from this area are Ayyubid-period issues from the same mints identified in the market and south khan assemblages.

Umbashi. Frank Braemer, Institut français d'archéologie du Proche-Orient, Jean-Claude Echallier, CNRS, and Ahmed Taraqqi, Directorate General of Antiquities, Damascus, report:

Two further field expeditions have allowed us to complete the exploration of Khirbet el-Umbashi, which was started in 1991. We have refined the relative and absolute chronology of the site. The sites of Hebariyeh and Khirbet ed-Dabab have also been plotted, and the borders of West Safa and North Kraa have been surveyed.

The necropolises of Khirbet el-Umbashi include at least 1,400 tombs of which 1,370 have been located. Their period of use extends over more than four centuries. The western area contains a previously unknown type of tomb, consisting of a door and a corridor for access to a burial vault.

In the northern area of the site, some plans of building remains belonging to the initial phase of construction have been completed. Only the wall foundations have been preserved; these consist of a double face of small blocks on a ground-level course. The walls delimit small narrow cells with more or less curved contours but not apse constructions proper. House VN 1 01, which dates from the sec-

ond and latest phase, has been wholly excavated; its outer walls were furnished with benches, and the roof was supported by a series of axial pillars. Calibrated radiocarbon dates have been obtained on the earliest hearth level in this area (2837–2349 B.C.; OXA LYON-65) and on ashes from the latest architectural phase of house VN 1 01 (2111–1789 B.C.; OXA LYON-64).

In the zone between the northern and southern areas, in the western area, and, even further westward, on the slopes of the Umbashi valley, we have plotted a great number of rectangular megalithic constructions combined with one or several quadrangular enclosures encompassed by a carefully built stone wall. We consider such structures, at least provisionally, as a particular type of settlement in a restricted chronological phase. This phase predates the building of houses in the western area but postdates the first occupation of the site.

Within the area of the ossiferous deposit found previously in the southern area, we have discovered a lens of burnt earth in a layer between the rock and the layer of bones. Precise redating of the bone deposit and, more importantly, of the ground level below this deposit and contemporary with the rampart wall, is made possible by sampling: the date obtained through an analysis carried out in Groningen in 1950 (4075 ± 160 B.P.) gives a calibrated date of 3020–2179 B.C., while the ground level contemporary with the rampart is dated to 3331–2938 B.C. (OXA LYON-63). The construction of the rampart, and hence of its first hydraulic system, took place at the turning point between the fourth and third millennia. We have at last identified how the outline of the rampart continues: at the summit of the southwestern unit, we suspect that a 60 × 30 m citadel was built onto the wall. If this hypothesis is correct, this building will be one of the oldest structures in the southern area.

The western part of the site is composed of several units of heterogeneous ruins. The whole of this agglomeration has been mapped at a scale of 1:500. Four sets of houses, separated by unbuilt areas, have been singled out for study. Primarily EB IV ceramics have been found in the cleared areas, but MB II material appeared during the excavation of the main cell of a house (VW 14) that revealed two floors with many grinding tools in place.

To the west of these agglomerated houses we have plotted two camping areas. One dates to the Early Bronze Age, while the other is poorly dated. Both camps lie along the channels that carry water from the main southwestern cistern to the agglomeration. The first camp includes round tents 2.7–3.5 m in

diameter supported by peripheral posts without central shoring. The second one comprises quadrangular cells. To the south of the southern area, we have also located and cleaned structures marked by a low crescent-shaped wall and a flat area, suggesting the remains of light camps.

Between Umbashi and Hebaryieh several different types of water catchment and storage works were found, representing a sum of technological experiments unparalleled in this period. The systems to collect slope wash convey the water into the bed of the Wadi Umbashi, directly above the dam and cistern connected with the rampart of the southern area; they may have been designed to increase the flow into this cistern at the time when its walls were raised. The main cistern is fed by tapping the Wadi Umbashi above the western agglomeration of houses by using a tapping dam, a wall that slants with respect to the wadi bed. A channel conveys the water down to a long natural basin, which had been arranged to serve as a cistern. The overflow of this cistern is discharged into two channels that carry the excess to secondary cisterns close to the agglomeration. A survey by electrical sounding of the main cistern allowed us to reconstruct the volume of water storage at over 30,000 m³. The dam connected with the southern rampart is the oldest such work preserved in the Near East. It is an earthen dam, no doubt based on a stone core set up directly on the wadi bed.

Surveys around Umbashi enabled us to locate a new site, Khirbet ed-Dabab, 7 km to the northeast within the Safa massif. The site dates from the end of the EB II period, and the agglomerated part has been plotted in full. It is a nonfortified site; in the middle, we have noted a hierarchy within the structures around the water source, which is next to a monumental tomb within an enclosure. On the periphery, clusters of houses are also separated by streets and lanes. The site includes some 50 houses preserved up to 3 m in height, showing construction techniques quite different from those of Umbashi. Here, we do not find roofs on pillars with slabs, but instead light roofs made of wood.

Plotting of another site, Hebaryieh, shows it to support only seven half-buried houses, of the same type seen in the western part of Umbashi's southern area. It is thus a tiny village, but its houses are built upon the remains of a large edifice, implying that, as at Umbashi, occupation of this site may have originated from a fortified settlement. The hydraulic system extends over several kilometers, diverting water from two small valleys into a large cistern.

Other than these two sites, no occupied site con-

temporaneous with Umbashi has been located. Khirbet Jerboua is a medieval fortified unit consisting of several houses backed onto the lava flow. The western border of the Safa, north of Umbashi, seems to be devoid of built-up settlement or even a concentration of camps. In the central basin of the Safa, no permanent habitation seems to exist. The only structures are the ever-present "desert kites," which suggest, after study, a function linked to animal domestication and cattle control. A muddy basin (El Aoui) situated on the western border of the Safa has revealed a large construction consisting of a 5–7 m accumulation of stones that form small honeycomb cells. The lithic material contains artifacts characteristic of the so-called "Khiamian" pre-Neolithic period. It is the easternmost site in the survey area, located in the most desertic zone of this period.

This two-year effort has allowed us to reconstruct a general plan of the history of settlement in the Khirbet el-Umbashi area. An original pioneering settlement was established between 3300 and 2900 B.C. and included a surrounding wall and a damming system. The area surrounded is about 5 ha, and no domestic building can be unequivocally attributed to this phase. At Hebariyeh, settlement also originates with a fortified structure.

Subsequently, an extensive settlement system connected with pastoralism developed outside the walls, consisting of at least four different building phases marked by quite different forms of construction: megalithic structures with pillars, also present at Hebariyeh; and a zone of hearths connected to smaller earthen structures built upon a foundation of small stones. In its maximum extension, settlement covered 40 ha near the beginning of the second millennium B.C.

Lastly, a period of clustered settlement follows this period of expansion and involves a minimum of two architectural phases, one consisting of scattered hamlets primarily in the western area and the other of a village aggregated in the southern area occupied until 1600–1400 B.C. The village, with about 30 houses, covers ca. 2 ha. In this survey, the agglomeration of Khirbet ed-Daba appears as a counterpoint:

we can date the site from the ceramics to the EB II/III transition; it was an aggregated, albeit nonfortified, settlement from the start.

Umm el-Marra. Hans H. Curvers, University of Amsterdam, and Glenn M. Schwartz, Johns Hopkins University, report:

In 1994, the Johns Hopkins University and the University of Amsterdam inaugurated a long-term program of excavation and regional analysis at Tell Umm el-Marra in the Jabbul plain, east of Aleppo. The main aim of the project is to investigate the developmental trajectory of early complex society in the Aleppo region, a major core area of western Syrian urban civilization. Among the problems to be considered are the origins of complex society in the third millennium B.C. (Early Bronze Age), the collapse at the end of the EB period, urban regeneration and formation of the Yamhad state in the early second millennium (Middle Bronze Age), and the incorporation of the area into the Mitannian and Hittite empires in the late second millennium (Late Bronze Age).

Umm el-Marra is the largest Bronze Age tell in the Jabbul, with ca. 25 ha demarcated by a city wall. Soundings conducted between 1978 and 1982 by a Belgian team directed by R. Tefnin identified Roman and Hellenistic remains deposited above Early, Middle, and Late Bronze occupation.²⁰ Given these results, Matthiae suggested an identification of Umm el-Marra with Tuba, a city mentioned frequently in the Ebla archives that later became the capital of a vassal kingdom of Yamhad. The Hopkins/Amsterdam team has formulated a three-stage strategy for the inauguration of its research in the Jabbul. Stage 1, now completed, entailed two excavation seasons (May–June in both 1994 and 1995) to obtain broad exposure of second-millennium occupation in a diversity of zones and to investigate the spatial organization of the Middle and Late Bronze city. Stage 2 will consist of a systematic surface survey of the Jabbul plain, and in stage 3, we will aim for a large excavated exposure of EB contexts at Umm el-Marra.

Acropolis. Nine 10 × 10 m squares were excavated

²⁰ Reports on this work include R. Tefnin, "Exploration archéologique au nord du lac de Djabboul (Syrie): Une campagne de sondages sur le site d'Oumm el-Marra, 1978," *Annuaire de l'Institut de philologie et d'histoire orientales et slaves* 23 (1979) 71–94; and Tefnin, "Tell Umm al-Marra," *AJO* 28 (1981/1982) 235–39. For discussion of Tuba, see P. Matthiae, "Du-ub di Mardikh IIB1 = Tu-ba di Alalakh VII," *Studi Eblaïti* 1 (1979) 115–18. The Halawa complex is published by J. Meyer, "Die Grabungen in Planquadrat Q," in W. Orth-

mann ed., *Halawa 1980–1986* (Bonn 1989) 19–56.

Funding for the 1994–1995 excavations was provided by, among others, the National Endowment for the Humanities, the National Geographic Society, and the Arthur and Isadora Dellheim Foundation. See also the forthcoming article by H. H. Curvers and G. M. Schwartz, "Umm el-Marra, a Bronze Age Urban Center in the Jabbul Plain, Western Syria," *AJA* 101:2 (1997).

in the western part of the site acropolis adjacent to the Belgian soundings where burned LB architecture (level IIb) had been identified. Minimal remains of a Roman occupation (Ia) were stratified above large pits apparently contemporary with a thick-walled rectangular building of Hellenistic date (Ib). Prior to Ib were two LB phases. While the later phase (IIa) was poorly preserved, the earlier (IIb) included a large complex of small rooms with homogenous domestic debris. Given the uniform construction and contents of these rooms, we tentatively interpret them as centrally planned housing for dependent workers, analogous to the MB complex excavated at Tell Halawa (Tell A, Planquadrat Q, level 2). Three phases of MB (period III) domestic occupation were identified below the period IIb architecture, all characterized by intensive modification and reconstruction.

In the eastern acropolis area, results from the six 10 × 10 m squares excavated include burned LB architecture constructed above three MB phases, the earliest of which contained a set of rooms built against a 2.6-m-thick mudbrick wall, perhaps an enclosure wall for the acropolis.

West and northwest areas. Below Roman and Hellenistic vestiges, the five 10 × 10 m squares excavated in west area A yielded evidence of burned LB domestic architecture. The apparent contemporaneity of these remains with the burned level IIb occupation on the acropolis is suggestive of a site-wide conflagration in the early LB period. The debris of one house included a small green-glazed ceramic jar and an Egyptian or Egyptianizing alabaster jar with duck-headed handles; a Mitannian Common-style faience cylinder seal was recovered from an outside area in a square to the northeast. Found in the same square, from deeper contexts, were the remains of a large-scale, possibly public, structure of apparent MB date. A 2-m-wide trench extending west to the tell edge revealed no evidence of a LB city wall but documented several MB phases of fortification; strata sloping down to the east inside the MB wall yielded a hematite cylinder seal of the style attributed by Collon to an "Aleppo workshop" associated with the Yamḥad royal court. East of west area A, two 10 × 10 m squares were opened in west area B, revealing a vast LB trash pit intruding into MB and EB deposits resting on bedrock.

In addition, four 10 × 10 m squares were excavated near the highest point of the tell in the northwest. Eroded Hellenistic architecture yielded a bronze ladle with a duck-headed handle, and below

this, a LB occupation included rectilinear domestic architecture, a small kiln, and a street with steps leading up to the city wall area.

Transects. Given the scarcity of sherds on the site's surface, systematic surface sherd collection was not undertaken. Instead, two transects were laid north-south and east-west across the site, and a 2 × 2 m pit was excavated every 20 m along these lines. Each square was taken down to its uppermost architectural feature. When ceramic analysis is concluded, a detailed picture of the temporal distribution of later occupations across the site will be available.

The MB phases exposed thus far contained ceramics characteristic of the middle and later segments of the Syrian MB period. The LB corpus compares with earlier LB (15th century B.C.) assemblages from Munbaqa (Ekalte) and Hadidi (Azu) on the Euphrates; particularly diagnostic were shallow bowls with inverted bead rims, as well as Nuzi ware and Cypriot White Slip II bowl sherds. Other aspects of LB material culture also displayed similarities to that of Emar (13th century B.C.), including clay humped-bull figurines and stone weights. The Hellenistic contexts were marked by "Persian" horse and rider figurines, glazed gray oil lamps, and ring-based bowls with incurving rims and a dark wash, while Roman-period remains included oil lamps and other ceramics characteristic of the later first century A.D.

To conclude, the 1994 and 1995 excavations at Umm el-Marra have provided a foundation for future research by documenting second-millennium, Hellenistic, and Roman occupation in a variety of zones across the site. The extensive LB occupation was an unexpected discovery of potentially great significance, since the period is only modestly attested in the archaeology of inland Syria, and the scale and character of the MB occupation also signals the site's importance in the period of Yamḥad. In addition to expanding and clarifying the second-millennium occupation, with attention to distribution patterns in faunal, botanical, and ceramic data, plans for future work include the initiation of a regional survey project and the exposure of occupation remains from the Early Bronze Age.

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